International Journal of Applied Arts Studies

Acknowledgement

In the Name of God

Dear Readers,

I, on behalf of the editorial board, am proud to present this issue of the *International Journal of Applied Arts Studies (IJAPAS)* under the sponsorship of the Islamic Azad University, Yazd Branch. We were driven to found the *IJAPAS* by a noticeable lack of journals, in the Islamic Republic of Iran in particular, devoted to architecture, urban design, urban planning, architectural conservation and restoration, painting, art history, graphic, digital arts, fashion design, performing art, industrial design, aesthetics and semantics. Although the academic world is increasingly driven by cross-disciplinary visions and models, we seek multi-disciplinary views, an attempt to inform researchers, graduate students, and professionals about the trends, ideas and innovations being put forward in applied arts. To this end, in addition to standard articles, in every volume of the *IJAPAS* we hope to provide a special issue related to a respective field with innovation.

We are also sending out a call for papers related to *Applied Arts* to appear in the next issue of *IJAPAS* in Nov – Dec 2020.

Finally, I should mention that we are committed to a speedy refereeing process for every article submitted to us. We effort to reply to all papers submitted within five weeks' time with a response about acceptance or rejection. We also do not require formatting for submissions in our style until *after* the paper has been accepted by us for publication.

I would like to thank our Editorial Board for their work so far in helping to establish the *IJAPAS*. And, finally, I would like to extend my deepest gratitude to Dr. Ali Boloor, the assistant editor of the *IJAPAS*, for all of his hard work to ensure the timely completion of the issue.

I am delighted to invite you to visit us at www.ijapas.org.

Sincerely,

Dr. Abolfazl Davodi Roknabadi
Editor-in-Chief
International Journal of Applied Arts Studies (IJAPAS)
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Investigating and Exploring Beauty Markers in Pseudo Dionysus' Works Focusing on Scholars' Views

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Abstract

Aesthetics term has been used for the first time by philosopher Alexander Baumgarten in 18th century which is referred to cognition through senses and sensory sciences. Although Mediaeval philosophic thought in west ignorance has been established based on Rome and Greek philosophy and has been formed by Christianity and has deep association with it, it is necessary to access to Old Testament books and ancient philosophers' thought to investigate aesthetics, so in order to achieve this goal scholars' views in different books have been used in this study. The present study extracts and verifies various aesthetic markers in the works of pseudo Dionysus and uses mixed qualitative and quantitative methods. Snowball sampling method employed to select scholars for interview and quantitative method conducted by Morgan Table. Books have been selected purposefully to extract elements, ATLASTI software applied to extract diagram in qualitative method and SPSS software also employed in quantitative method to do the related calculations. Results showed that 34 markers are extracted including light, proportion, being bright, absence of excess and…which in qualitative results ultra-beauty, coma, the best beneficence and… are the most repeated ones, but in quantitative sources integrity, creativity, ultra-beauty, absence of excess, harmonious, perfection, source and destination of everything and light have the most proportion.

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1. Introduction

Discussing on Beauty is discussing about a subject which seems so difficult since it is so obvious, as if beauty is so close that defining it will be obvious. But in fact beauty is a topic which has never been perfectly and truly defined by any scholar or philosopher (Saremi et al., 2015: 161) beauty and consequently aesthetics has no beginning and it seems it has no end, beauty has been discussed from the beginning of philosophy history and when human started contemplating properly. In order to go through the subject it has to be mentioned at first that a subject called beauty is indebted and is considered as causal object and effect. Basically, those phenomena which cause evolution and change in human will be scrutinized. In simpler terms, what approximates us to beauty concept is human internal cognition at first stage and not the original identity of beauty, human recognition ignorance is what that defines beauty as a passive phenomenon at the cognition stage. The most human be scrutinized as the object of this subject or as the effect of this cause, the more obvious the identity of that cause or subject-beauty- will be. Basically subjects and phenomena which are considered in human sciences and human couldn't achieve them or represent a true definition of them have been those subjects which have direct or close relationship with human, in the other words absence of comprehensive and perfect definitions is due to absence of a comprehensive and perfect definition of human. Here we are encountered with this issue that beauty is among those subjects directly in relationship with human and this subject means complexity in defining and realizing it. Until when human is not defined truly and comprehensively, the beauty will be still ambiguous. And if human is defined from materialistic perspective, the beauty will be nothing more than a material. Dionysus lived in the late of 5th and early of 6th centuries and he was known as a saint because he named himself the disciple of Paul the Apostle, he is known as a neo-platonic philosopher with four theses and ten letters (Ilkhani, 2011: 70):
- Divine names
- Inner speech
- Heavenly hierarchy
- Spirituality hierarchy

The current study which aims at extracting beauty agents in other scholars' point of view towards his works, tries to answer these questions that what existing markers in Dionysus's works beauty are in scholars' perspectives and which of them has the most effect.

2. Theoretical Basics

Here at first article lexicology is investigated and then a summary of each of scholars' views about beauty will be represented and next necessary concepts offered for extraction and books codification.

2.1. Beauty of Lexicology

According to Islamic and Iranian mysticism, Jamal is equivalent to gracefulness and beauty and Jamal Ilahi means divine beauty. However, Hosn means excellence and beauty and Jamil means fair (Saremi, 2004: 131). Beauty or gracefulness is an epithet which leads to joy, jubilation and inner satisfaction for things or it is considered a spiritual matter which is appeared besides celestial allegories and facts to the tangible world. Materialistic beauties are originated from beauty source

which is the absolute divine excellence (Afrasiabpour, 2009: 93) or some others have considered beauty based on the ornament which is applied to things and appears to them. Beauty means glory and ornament which occurs to images and meaning (Armstrong, 2004: 5). According to Moein Dictionary: beauty means order and coordination as well as glory and purity in a thing and motivates ration, imagination and human sublime inclinations and creates pleasure and delight (Moein, 1982: 1768) according to Al-Mu'jam Al-Waseet as one of the oldest and most valuable Islamic books beauty is: a state exists in person or thing, based on philosophers' view, gracefulness and beauty is an epithet which is observed in things and is the state of satisfaction and happiness in human.

2.2. Beauty in Pythagoras' View

Pythagoras the "Ionian" philosopher and mathematician was from "Samos" whose theories have great influence on the thoughts after him. He was an austere person who often encouraged people to self-prohibition. He was the founder of a religion which had deep influence on mathematics which this influence continued for years and centuries in mathematics and music world. Pythagoras made efforts to generally explore existing rules in numbers and tried to relate world rules to numbers by theories and reasons. On the other hand they have tried to introduce geometry and mathematics as the basic science in this world and relate all affairs finally to this science. This kind of attitude was so profound and penetrative which created deep roots in the Greeks and their followers. Tetraktys is a symbolic role which Pythagoras followers swore to it; this role is the perfect and typical visualization of numerical concept reduction to special concept and arithmetic concept to geometrical concept. Each side of this triangle is made up of four points which reach a single point in the center of triangle, the unity which forms other numbers. So that number four is synonym of power, justice and integrity, a triangle which is made up of three rows of number four is the symbol of absolute equality and it will be remained so. The sum up of this triangle's points is ten and all other numbers will be expressed by the first ten numbers (Eco, 2001: 35). Proportion is among the first component which is seen and makes beautiful item be distinguished and judged. In ancient Greeks' view also proportion and coordination has been among the most important and sometimes the main element in the beauty of a thing. Pythagoreans paid special attention to numbers which could limit the reality, order it and make it understandable. Pythagoras is the founder of a kind of mathematical aesthetics perspective in the universes which everything exits there only due to order and realization of mathematics rules causes order in them which means a condition of beauty existence (Eco, 2001: 29). Pythagorean followers were among the first people who made attempt to explore music rules seriously and explored rules dominant on musical tunes. They tried to find the harmony between notes and extracted the relationship between string length and treble and bass. Pythagoreans maintained that what is considered as harmony in music, is regarded as the origin of all beautiful things. That is everything which is recognized as harmony causes beauty and every beautiful thing or any beautiful item benefits from harmony.

Symmetry problems was one of the problems that Pythagoreans have entered it to Greeks' philosophy and thought and introduced it as absolute principal for a long time. On one hand the issue of conflicts in different types of nature phenomena was proposed and on the other hand the compatibility of these conflicts in one place and next to each other caused beauty and ugliness. There were various theories about existing conflicts among phenomena. Conflict includes unity and plurality, straight and curved, left and right or odd or even, limited and unlimited and things like that. Finally the theory of "Heraclitus" is accepted and in his opinion reality is a united but plural topic. According to his view, controversies conflict is not only a stain on united unity but

also it is a basis for its existence. In fact "unity" only exits in controversies conflict. This conflict is for the basic unity existence (Coplestone, 2010: 52). Heraclitus mentioned about controversies battle and this conflict among controversies somewhere else that we have to know everything exists in the war and controversy is justice and all things are create and are destroyed due to controversy (Coplestone, 2010: 52). Since this issue has been accepted as a principal for Heraclitus, he believed that one could not achieve the essence of contradictory matters by omitting an element.

2.3. Beauty in the View of Socrates and Plato

These two theories are introduced in one section since the theories of these two philosophers are in one form and also Plato's views were narrated from Socrates. What is expressed as beauty in Plato writings is in his three theses called The Symposium, Phaedrus and Republic. Beauty (kalon) is among the concept which has been applied broadly in Plato's language. Beauty is not only visualized in artworks of Plato's dialogue, but what we call it now artwork, has been one of the results of human working and production and it is only limited to occupation and industry and has no difference with other human products. For this reason Plato could comment on the social effect of artwork so simply and plainly (Ahmadi, 2010: 54). Plato's view about beauty leads to two general attitudes about beauty for long centuries. These two views were expanded including: 1- beauty as harmony and proportion among components (adopted from Pythagoras) 2- beauty as glory which has been explained in Phaedrus book and later this attitude had direct effect on neo-platonic thoughts (Eco, 2001: 25).

Socrates narrates from Diotima that what love is, he maintains in some sentences that love is an effort to achieve goodness and fortune. Because goodness is the only self and all humans are making effort to achieve goodness. Diotima says that goodness seekers or those who love to achieve it have to make effort, that is "to enrich something beautiful, whatever that beautiful thing is, body or soul" Diotima has taught Socrates that unlike Socrates's primary thought the goal of love is the beauty itself but the duty of love is to enrich beauty. Diotima says Socrates that the person who wishes to achieve the ultimate goal of love has to fall in love with beautiful bodies during his youth, later he realizes that beautiful bodies don't differ with each other. Passing this stage, he will see beautiful soul and will know that soul beauty is much more than body beauty. Next he will step higher levels and perceives the beauty of temper, manners, rules and traditions. Then he learns beauty, knowledge and art by a guider and finally he will achieve the absolute beauty and will aspire for it then here Socrates narrates from Diotima and starts investigating and explaining abstract beauty. Diotima has described that beauty is eternal which has not been created and has not been removed. It has not been grown and has not been disappeared it is not sometimes ugly and not sometimes beautiful.

There is desire and tendency in Eros term. Some believe that this tendency can be physical or non-physical, but the fact is that Eros tends to own good things, creation and production. This desire flows throughout the whole world and appears in two dimensions in human. One dimension is physical reason which human reaches a kind of immortality and eternality (Reed, 2009: 40) there is another kind of Eros which seems more important and more sublime. This kind of beauty is the desire to fact, goodness and beauty. This beauty leads to the formation of artists' artworks and draws human from tangible beauty to rational beauty.

Acts and spiritual progress that lover has to do is another issue in relation with love and beauty. This issue has been analyzed comprehensively and extensively in Islamic aesthetics and selected as a model for mystics, in the other words mystic has called himself lover and made great attempts in spiritual progress to achieve the absolute beauty countenance and the fact which is the Holiness

Oneness, therefor mentioning this matter is considered in beauty and love. Platonic Socrates explains lover madness issue to clarify true beauty issue and also to justify that lovers have to be preferred to non-lovers and speaks in praise of different types of madness, he maintains that love madness is the greatest gift that gods have granted to the humans. After classifying souls, Socrates speaks about the soul of philosopher who has the perception ability as idea. Socrates eulogizes the soul of philosopher and maintains that the soul of philosopher is the watching of his God. Then he describes the philosopher's soul and says: he is the person who remembers true beauty by seeing beauty in this world. He wants to fly. But because he is not able to fly, looks at the sky like a broken-wing bird and ignores what is going on in the Earth. So people call him mad. But this madness is much nobler than other types of madness. The origin of this madness is more sublime and the person, who gets involved in this madness and loves with true beauty, falls in love (Plato, 2001). Then Socrates mentions that in a sublime day which has happened in ideas world, beauty has had special glory and magnificence and so the effects of that beauty appear in human's look. On the other hand, remembering discussion of that day will be about corruption and sin of people, efficiency and exploitation from beauty.

Socrates believes that beauty is the most enchanting and the most attractive matter in this world. Plato argues that due to the attractiveness of beauty, when he sees something beautiful, he will be encouraged to beyond that thing and to beyond the inherent beauty of that thing and then through this inherent inclination the human archives the perception of existence "the human's soul has seen the true beauty and absolute excellence which is the candid goodness in the abstract world and before entering this world, so he remembers that absolute beauty which has perceived it before as external, relative or virtual sense. Then he feels separation grief and love involves him, he enticed with beauty and like a caged bird desires to fly towards it. Kindness emotions and worlds are all the joy to God's countenance, but physical love is a virtual manifestation like excellence and true love is a melancholy which maddens the sage and as virtual love exits body from sterility and causes child and survival of humankind, true love also releases soul and reason from sterility and causes oriental perception and finding eternal life that is inclination to fact beauty cognition and absolute goodness of life and spirit and human achieves the knowledge perfection when achieves God and attains His beauty watching and when transpiring and transpired and rational and rationed are unified" (Foroughi, 1975: 25).

Therefore, human's senses have to be integrated with reason to be able to achieve true love, Plato believes that beauty has independent and free existence and is free from physical intermediaries which randomly are expressed by it, so beauty is not limited to any specific tangible thing, but it shines everywhere per se (Eco, 2001: 26). Joseph Kockelman maintains that in Plato's view, fact and beauty are related to one single idea and matter. That single matter was existence realization and these two have one thing in common and that is existence appearing which causes continuation and remaining of both beauty and fact (Gallagher, 2006: 7). In Plato's view, a new world of thing perception obtains our beauty where fact and pure existence exist, in the other words when beautiful things are seen, that noble and pure beauty are imagined in human's mind and cause worship and appreciation of humankind. But Plato himself mentioned that only few people achieve this insight and this is not possible for everybody. Those who perceive beauty per se are few and this is not generalizable to all people. Plato himself says that:

"I said lovers of sounds, scenes, voices, colors and shapes are unable to appreciate abstract beauty, he said that is right, I said but those who are able to achieve the inherent beauty and observe its beauty are rare" (Plato, 2001: 300). Plato maintains that the ability to perceive beauty belongs to the philosopher and his soul. Consequently, he values the philosophers' soul and believes that if

commons are not able to perceive real beauty, philosopher is able to do so and he is able to achieve the truth of beauty. "Commons are limited to visit beautiful things, without soaring to watch the origin of beauty, only a philosopher is able to understand the real perception and the essence of reality" (Werner, 2003: 79). Here Plato neither refers to the definition of abstract beauty and nor suggests a definition of tangible beauty. Fredrick Coplestone following Plato's narration maintains that there is difference between pleasure connected to beauty perception and beauty itself and his speech has to be in relation with his statement that size and proportion reach beauty and virtue everywhere" and consequently beauty must be seen in size and proportion (Coplestone, 2010: 293). Plato considers that perception of absolute beauty and abstract beauty is related to this matter that tangible beauty is integration and unification of the beauty of ethics, beauty of manner and beauty of knowledge and wisdom in human with each other.

It is a unit which is not felt, it is not a word, a thought or a science. It is inside nothing it is inside self and for self. All the things that are called beautiful, somehow take advantage from beauty. Whatever we call beautiful, undertakes corruption and deterioration. But that beautiful is not exposed to any transformation and change and each beautiful creature is the illustration of that inherent beauty (Plato, 2001: 724). Therefore, Socrates believes that after achieving absolute beauty, earthly beauties will be ignorant to human's eye and finally Socrates continues that achieving this beauty causes obtaining wisdom and the person who reaches this level considers the soul and shadows of such wisdoms worthless "the reward of that who creates true virtues is to be considered among God's friends and will have eternal life (Plato, 2001: 728)".

Attention to goodness is one of the concepts important in Plato's beauty philosophy. The explanation of goodness concept is in Republic treatise. In many Plato's treatises, goodness and beauty are synonymous with each other. In Greek terminology, Agathon term means both goodness and beauty. in Symposium treatise also a young poet named Agathon considers beauty and goodness synonymous, but in Hippias treatise goodness and beauty are not the same, in this treatise some discussion are mentioned between Socrates and Hippias. Hippias maintains that everything can be beautiful. Even his sermons and potteries which have been proportioned and coordinated are also beautiful. Socrates replies him that all of them can be beautiful but it is obvious that they are not the beauty itself. What is beauty itself? Is the origin of beauty discussion, Socrates answers that beauty is different from proportion? Because proportion makes a shape looks beautiful. Since the cause of something is nothing expect that thing itself, so proportion cannot be beauty itself. Then the relationship between usefulness and beauty is considered in the following. He shows that beauty is different from usefulness. Since usefulness and goodness are both creatures of beauty. According to the argumentation of cause and effect separation, it can be concluded that beauty cannot be usefulness. Beauty in its own essence, the best example of beauty, has been illustrated in its best form in Symposium where beauty is placed on the top of hierarchy of beautiful items and transcends all of them, since the examples are supposed to go beyond their evidences, "Symposium" doesn't talk about another exemplar illustration and prefers to sacrifice adoration only for beauty (Papas et al., 2004: 77). Plato maintains that if we follow ourselves in the spiritual progress finally we reach a single truth which include all other truths and that is "goodness" or "excellence". Because Plato maintains that goodness and beauty are not separated from each other. And as things exist due to sun warmth, facts also created through the blessing of absolute goodness that is the God of universe (Foroughi, 1975: 24). Another discussion which is narrated from Socrates by Plato is the relationship between beauty and pleasure. Since Homer has considered beauty and pleasure related with each other, so ancient Greeks believed that beauty has a close relationship with pleasure and it is difficult and sometime impossible to distinguish between these

two. Socrates says that we take pleasure of every beautiful thing but the question is that why we don't call all those things that create especial pleasure beautiful. But Socrates didn't answer this question obviously and only rejects other people's views. Plato mentions this matter in Nomoi treatise that not pleasure but correctness and truth is a criterion for beauty value. Then he defines that "correctness is the balance that each artwork has to enjoy regarding size and other features" (Plato, 2001: 552). Then he defines the criterion for evaluation and judgment of an artwork." Everyone tries to not making a mistake in judging a poem or music, first he has to know what that piece is going to illustrate and second he has to know what that piece or poem has for learning the destination. Everybody who is unaware of these two matters will be unable to discern artwork (Plato, 2001: 558). Plato in one of artwork considers the generality as a pivot and believes that in an artwork generality it would be possible to observe it beautifully (Parsa, 2016: 8). Plato mentions beauty more than any other quality which permits rational perception, he images the absolute beauty whose nature can be expressed without depending on especial beauties things natures. It is not because the essence of real beauty is made up of features without visible nobles. Socrates supposed to formalize artistic acts in conceptual level and so he determined three aesthetic items: 1- ideal beauty: which is nature representation through classifying its sections 2- spiritual beauty: which considers eye as the demonstrative of soul and 3- usefulness and applied beauty (Eco, 2001: 25).

2.4. Beauty in Aristotle's View

Aristotle explained minor details in his aesthetic philosophy and represented less content about beauty general subjects. Some believe that those general issues of aesthetics which he has mentioned them have been in his lost books and treatises which are not available anymore; therefore, his remained thoughts and beliefs are bout tragedy or music.

Kant argues that Aristotle is the first person who has introduced aesthetics as a scientific knowledge and matter which is able to be judged: in other words, it was Aristotle who has tried to establish an independent system for art and to some extent beauty concept. Since Plato is known as pioneer and professor of Aristotle, so it is not strange that Aristotle's views are so close to Plato's ones. He used platonic thoughts, but he tried to comprehensively represent those contents in Plato's writings which were satiric. Aristotle used works of other contemporary artists to express his art philosophy and aesthetics, works of "Sophocles", "Euripides" and also sculptors before him like "Phidias" and "Polyclitus". Therefore, Aristotle's aesthetics has been influenced by his contemporaries and have been related to the works before him, but he has always respected famous works before him.

Aristotle also mentioned two kinds of beauty derived adopted from Plato's thought. He divided beauty into two clusters. One cluster named as "big" beauty and another one introduced as "pleasant" beauty. Aristotle didn't described these two beauties so much but finally explained that second type of beauty is related to pleasure and nothing else; in other words, "pleasant" beauty exists only to makes pleasure in human and has no other goal or purpose.

Aristotle remarked about beauty in concise and sometimes ambiguous sentences and therefore, it is necessary to extract concepts to understand ideas and beliefs. Aristotle defined beauty as: "beauty is something which is valuable per se and also makes pleasure." (Narrated from Tartarkiewics, 2005: 17) based on his definition from beauty it can be concluded that Aristotle believes that beauty is a matter which is valuable per se and not its effect or other factors are valuable. Second issue and more important is that Aristotle construes beauty in "pleasure" and the definition that Aristotle introduced from beauty is compatible with ancient Greeks' thoughts. It is important to mention that

Aristotle's definition from beauty and his view to beautiful matter is much more general than the present concept from beauty. He considers art, beautiful matters and spiritualties as a general matter called "beauty" and also defines aesthetics as a component of beauty. So evaluation and measurement and also "pleasure" are valuable. Aristotle said about pleasure that: "if we contemplate, the pleasure of activity is soul strength, each strength of soul strengths which acts in its most beautiful matter, emerges its act and it is always pleasure… so whenever eye acts in beauties that is sees them, does its act in its best form and takes pleasure. Then pleasure is permissible and of course necessary for felicity but pleasures are different and have degrees. The noblest pleasure belongs to the noblest human's component that is reason whose act is thinking. Moreover all soul's activities are for a purpose unless contemplation and thinking which are purpose themselves. So pleasure and the highest pleasure is the desired extremity that is felicity perfection" (Foroughi, 1975: 47). "Aristotle considers beauty inherent in a beautiful thing. He concludes that the reasons of all things are truly "beautiful". He maintains that some things are naturally beautiful-and more relevant-detects what is really beautiful rather than something which is perceived as goodness by its preceptor; so that beauty claims mention to more than one observer's request; it can be concluded for sure that Aristotle and Plato have common ideas about beauty" (Papas et al., 2004: 82).

The point that has to be searched among Aristotle's views is the features of a beautiful thing from Aristotle's perspective. To answer this question, first it has to be mentioned that beauty is illustrated in materialistic affairs. Aristotle mostly accompanies "beauty" with "face" which are related to two meaning fields: one is related to "figure", "shape", "appearance" and "perception"; another one is "function", "perfection" and "usefulness" (Papas et al., 2004: 67).

Aristotle mentions in two treaties of Poetics and Politics that beauty depends on two factors of "order" and "size". He also relates beauty to "appropriateness" in his metaphysics treatise. So concluding all it has to say that Aristotle has related beauty to factors of "order", "size" and "appropriateness". But some believe that Aristotle related beauty to two factors of order and size. This is because he desired to identify "appropriates" with "order" and considered beauty dependent on two features that is "order" and "size" (Tartarkiewics, 2005: 16) what Aristotle has considered as order, is in fact the most suitable combination which recognized as "form" later.

Aristotle resigned broadly from the infinite, measurable and sublime meaning of beauty-which was found in the ancestors' views especially Plato; and limited beauty to "size", "order", "appropriateness" and "symmetry" and from another hand to "efficiency", "usefulness" and "payment" (Papas et al., 2004: 67). Aristotle added "compatibility theory" to Pythagoreans' theory. Aristotle's compatibility theory emphasized that if determined rations make things beautiful, it is not because they are perfect per se; but because they are compatible, since they are in compatibility and coordination with their essence.

Another important point is that explaining about "size" and its relation with beauty has been Aristotle's invention himself. Aristotle meant appropriate size with desired dimensions for specific things by size. In his opinion, bigger things provide more pleasure rather than smaller ones. He wrote although small humans are maybe graceful and charming, they are not beautiful. On the other hand he maintained that if things be so big, they won't be beautiful and this is due to human's perception essence (Tartarkiewics, 2005: 17).

Aristotle believes that beauty is in perceptible matters; in the other words, what is perceptible can be beautiful. As mentioned earlier, Aristotle says in Metaphysics treatise that order and appropriateness are among the influential features in a thing beauty determination. On the other hand, he mentions limited size; therefore, as a main factor in aesthetics domain, he refers to this

matter that beauty is not perceptible or understandable in matters which are not limited. Since size won't be definable for them. In fact, size is understandable and more tangible to mind and as a result it will be more pleasurable. Aristotle believes that when a thing be compatible with the capacity and ability of "senses", "imagination" and "memory", pleasure will be provided in that thing. These interpretations show that what artiste has had in his mind about beauty, is the beauty in materialistic matters rather than psychic ones. On the other hand, such view is so general. Aristotle maintained appropriateness corresponding to perception capability. So it is necessary to mention that perception capability is the main condition and also considered as the integrity and unity in an artwork. Like most of the Greeks Aristotle also believed that unity increases artistic quality. Aristotle considers sense of belonging and humanity for a beautiful matter. He argues that beauty is a matter which belongs to human. He believes that what human perceives though eyesight and hearing senses and causes pleasure in him is approximated to beautiful matter.

Aristotle expresses that experiencing a "beautiful matter" is like creating a spelling state in human and as if the person is enchanted. He believes that beauty and the pleasure derived from it, has a passive state. Aristotle maintained that although beauty has to be limited to "size" and "appropriateness", in aesthetics experience, sometimes extremity in size causes pleasure or at least doesn't cause complaint. From Aristotle's views it can be concluded that his view towards art and beauty is more personal or physiological. Aristotle considers this dimension of beauty which purifies soul. This is that kind of purification which can be compared with soul refinement with some ignorance. "Aristotle's view is in contrast with Plato's one who considered art a low component of soul' (Ahmadi, 2010: 64). Aristotle suggested one of the first definitions of aesthetics. He expresses beauty personally that: "beauty is the estimation of order, symmetry and determination which is detected in determined degrees in mathematics" (Aristotle, 1979: 37). In Aristotle's view these three factors are among beauty conditions but they are not enough. Aristotle's purpose of order is the natural order; not mathematical or industrial or geometrical order. He maintains that in nature domain, no disorder thing exists (Rezaei, 2004: 17).

2.5. Aesthetics in Augustin's Thoughts

Augustin's views do not exit separately in treatises. But it seems that he has had a treatise about beauty which is lost and is not available anymore; but however he mentioned some contents about beauty in his other works in a scattered manner which is possible to extract his general theory about this subject.

Augustin speaks about beauty and aesthetics in the thirteenth chapter of fourth part of his book named "Confessions". "He discriminates between the beauty which belongs to things and forms their totality; and that beauty which belongs to them and is a component of their totality or is appropriate with another thing." (Beardsley and Hospers, 2008: 19). Augustin's theory main concepts are: order, appropriateness, equality, number and unity. Augustin maintains that unity is not only considered in arts, but it is possible to find unity in the realities of all matters. "Existence of single things in the form of unity and the possibility to compare them according to equality or similarity looks like creation of appropriateness, number and size" (narrated by Beardsley and Hospers, 2008: 19). Augustin strongly put emphasis on appropriates, coordination, compatibility and harmony especially in association with music which Bollitos considers it regulated based on numbers in its Pythagorean meaning. Augustin also finds out beauty in its neo-platonic meaning as order or simplicity after Plotinus and establishes a conflict among the following authors on qualitative beauty and quantitative beauty. For Augustin light, color, radiation, glaze and clarity were beautiful and God' unity proofs too. Unity in plurality and also unity in essence is considered

as beautiful matter" (Papas et al., 2004: 68). Augustin mentions again and again in his book that number is a fundamental factor both for beauty and for existence. "Measure the beauty of physical face to find out that everything exists in …number" (Aertsen, 1998: 42). In his view number provides order. That is it is possible to consider goal or purpose for things by number and to make those parts which do not enjoy essential equality, equal and to create appropriateness in a thing which finally leads to beauty in that thing. On the other hand number causes integrity. This integrity finally induces beauty to shape; it also gives coordination and especial order to that thing and at last cause beauty. One of the features of Augustin's views is that he considers beauty perception as a guarantee for criterion-oriented judgment. He believes that we perceive ordered things as they are but we cannot perceive rightfully those things which are not ordered and so things with order are more beautiful to us or are nearer to beauty.

2.6. Beauty in Thomas Aquinas' View

Thomas Aquinas, the Christian philosopher and thinker was one of the most influential thinkers who was theorizing in aesthetics field during Medieval Ages. Thomas' specific prestige was in "peripatetic wisdom" that is he took reins of Aristotle's philosophy totally and represented it with brief interferences in it to be compatible with Christianity principles and context (Foroughi, 1975: 95-96). He was the best introducer and promoter of Aristotle's philosophy in Europe and he is called " Mediaeval Ages Aristotle" too and he has many compilations based on that scientist's educations in natural sciences, he also adopted from "Averroes", Muhammad Zakariya" and especially from Avicenna, he didn't ignored other Greek wisdom majors including mathematics, theology and ethics" (Foroughi, 1975: 95). In Aquinas' thought issues like "appropriateness with coordination", "clarity", "totality or perfection" plays a key role. As mentioned earlier, Aquinas didn't inclined to aesthetics discussions; but since he couldn't ignore it in his philosophy tried to explain and expand it as possible. Some attribute a treatise called "Beautiful Treatise" to Aquinas; but Tartarkiewics maintains that this treatise doesn't belong to him and basically he didn't assign a separate section to "beauty" in his writings.

In his opinion, Aquinas only refers to "beauty" when he explains the issues related to it. However, he fully benefited from Aristotle's thoughts in the explanation of his philosophy issues and has reflected them obviously. "Aquinas is completely abstract and thoughtful in art theory by taking advantage from Poetics and Nicomachean Ethics as his main sources (Bourek, 2008: 19). Aquinas has introduced a theory in beauty which presented throughout all thought of middle centuries; and that beauty was the absolute metaphysical and transcendental existence. From this view, the existence of manifestation is the face radiance and face is beautiful and is pleasant too. The relationship between beauty and face reaches beyond the limit and analogy in the expansion of beauty and infinity association and plurality and abundance" (Papas et al., 2004: 69).

He investigates beauty from two different dimensions. These two dimensions are "perception" and "seeing" which finally associate with beauty. First he introduces a brief definition of beauty and considers the role of beauty evidence in aesthetic experience, conceptual distinction between "good" and "beautiful", the pleasure of aesthetics and ornamentalism, the conceptual relationship between beauty and perfection and at last the distinction among art and science. Here Thomas' main predicates are mentioned under beauty matter (Tartarkiewics, 2005: 51).

1. Besides sensorial beauty, logical beauty also exits. (In other words, as well as physical or bodily beauty, spiritual or inner beauty also exists.).
2. There is a perfect and divine beauty as well as imperfect beauty which is perceived by sensory experience.

3. Imperfect beauty is the reflection of perfect beauty and due to perfect beauty is Pythagorean in inside not platonic.

Another important issue in aesthetics system is paying attention to "glory" and "grandeur" and also "brilliance". Aquinas paid attention to appropriateness as well as glory and brilliance. This issue dominated over all aesthetics during medieval ages and almost all theorists mentioned this subject in this era. As it is obvious in the architecture of this era, the issue of construction glory and also surfaces brilliance are considered as useful factors.

Thomas mentions two kinds of desirability in his statements and believes that pleasure is caused from these two types. One of them is called "rational" and another one is "natural". Rational pleasure is that kind of pleasure which leads to beauty recognition and is limited to human but natural beauty exits in animals too. Natural pleasure is more related to satisfaction and desirability and is associated with animal aspects of human. Aquinas maintains that animal pleasures are associated with touching sense but rational pleasure is perceived and deducted by seeing and hearing senses. On the other hand, human's natural pleasure is defined based on willingness to survival.

Another important issue in Aquinas' aesthetics is expressing beauty objective characteristics in his look; in the other words, the issue which visualizes beauty in his mind, is both the issue of beautiful thing and is the issue of "beauty" observer. This is also expressed in the form of "evidence beauty" and "evidence beauty". In the other words, here Aquinas tends to mention the factors in the perception of a beautiful thing. It is important to say that Thomas in spiritual beauty mentions that "desirable" or "delectable" is one of "good" divisions. Regarding "desirable" matter he believes that "what makes desire movement statically ends in a desirable thing, is "pleasant"; and beauty is the thing which is pleasant in "being seen" (Beardsley and Hospers, 2008: 21). Therefore, Aquinas considers beauty in face and on the other hand it is important to mention that he generalizes seeing sense to all kinds of cognitive perceptions. Aquinas maintained that "some artistic artifacts are merely useful, some others may be beautiful and finally some only exist on thought system. He really identifies "beautiful matter" with "good"; but insisted that they are different from their apparent meaning. Thomas besides his references to divine names interpretation says that: "everything which enjoys spiritual and materialistic glittering and shining, is beautiful" then in "Jame' Elmolkalam" says with more brevity that: "beauty is a kind of shining and appropriateness" (Tartarkiewics, 2005: 54). So appropriateness plays a key role in this definition. Medieval age considers appropriateness in a vast expansion and has Pythagorean perspective towards appropriateness. Pythagoras' view to appropriateness was quantitative and mathematical.

3. Summarizing Extracted Factors from Beauty

Here all beauty markers mentioned by above philosophers have been extracted in case to be used as codification table.

Table 1 Extracting mentioned variables in relation with beauty by different philosophers

Philosopher	Extracted variables for beauty definition
Ancient Greece	Loving, temperance, coordination, appropriateness, goodness, illegitimate admiration, the most just, observing limits, avoidance from arrogance, absence of extravagance, moderation, balance, symmetry, paying eye's attention to self, being pleasant, perceptible dimensions of sense, static form, superior and distinguished, wonderful matter, like a thing beyond analogies and distinctions, related to infinity, related to everything, related to gods, nature and natural things, as a matter related to limited things, figures, colors, sounds, thoughts, habits, characters and rules, inseparable from goodness and perfection, more related to light and visible things rather than to poem and music, order, related to appropriateness and operation, what is eye-catching and ear-catching.
Pythagoras	Number four, power, justice, integrity, body coordination, form and beauty, order, mathematical laws justification, harmony in music, symmetry, conflicts, unity in plurality
Socrates and Plato	Homogeneity, appropriateness among components, glory, goodness, love, ethics beauty, laws beauty, knowledge beauty, art beauty, single beauty, idea beauty, artworks, ownership on good things, creation and production, the one God, most enchanting affairs, the most attractive affairs, independency and brilliance everywhere, absolute beauty, drawn figures by ruler, triangle and compass, size and proportion, the combination of ethics, manner and knowledge beauty, usefulness goodness, goodness, pleasure, proportion and unity, justice with courage, ideal beauty, spiritual beauty, applied beauty
Aristotle	Judgeable, big beauty, desired beauty, valuable per se, pleasurable, the pleasure of thought and contemplation, higher than usefulness, more appearance in substance, order and size, proportion, coordination, symmetry, efficiency, suitability, use, payment, determined ratios, bigger thing, perceptible, limitedness in size, appropriate with senses, imagination and memory capacity, conforming with senses, specific to human, extravagance in it doesn't make complaint, result of order, symmetry and determination
Augustine	Both materialistic and spiritual, order, equality, appropriateness, number, unity, coordination, accordance and harmony, order and simplicity, light, color, radiation, shining and clarity, both beautiful and evidence, unity in plurality, number
Aquinas	Appropriateness with coordination, clarity, totality or perfection, face shining, infinity, plurality and abundance, rational beauty, glory, grandeur, radiation, logical pleasure, desirable, delectable, good, being desirable, body suitable combination, able to be seen or heard, appropriate with application, resistance, integrity, solidarity

4. Methodology

The present study is a basic-applied research which uses embedded mixed design and qualitative in quantitative embedded research method employed to answer the questions. Grounded method is used in qualitative method for codification and casual-comparative method applied in quantitative

method which first has been conducted by extracting concepts from scientists' texts and books codification. This productivity continues until the achievement of theoretical saturation then categories and codes extracted from questionnaires compilation are used, to investigate the correctness of codified table in pre-codification stage and then after codification, future studies of researchers are employed and questionnaire validity determined by CVI=0.78 formula and its reliability determined by Cronbach'alpha-0.72. Preplanned coding table is used for facilitation.

ATLAS-ti software and open and axial coding are used for content analysis including:

4.1. Open Coding

Open coding process, is an analysis through which identified concepts with their dimensions and features are explored in data (Lee et al., 2011: 49). In this stage, grounded theory forms information initial categories about the phenomenon under investigation by segmentation. The researcher establishes categories on the collected data such as interviews, observations, facts or his/her notes (Creswell, 2005: 9. 397).

4.2. Axial Coding

It is the process of relating categories to subcategories and associating categories in the level of features and dimensions, so this coding is called axial. Coding is conducted around the axis of a category (Lee, 2001: 249). The following table shows that Strauss has discussed about some basic measures in axial coding stage (Lee, 2001: 50).

Table 2 Stages of axial coding (Lee et al., 2011: 49)

1	Expressing the features and dimensions of a category, a measure which begins during open coding
2	Identifying different conditions, different actions and reactions and different consequences related to a phenomenon
3	Relating one category to its subcategories through predicates which explain how they are related to each other
4	Searching for clues in data which imply how possible data are related to main categories

SPSS software is used to analyze results from questionnaires and also prediction tests in quantitative stage.

5. Sampling

This stage includes two different quantitative and qualitative samplings.

5.1. Qualitative Sampling

First, 20 experts who had a commanding view of beauty and pseudo Dionysus have been selected by snowball sampling method, they were asked to score 1 to 10 to introduced books about pseudo Dionysus related to beauty and books with average score higher than 5 were selected and referred again to the experts to confirm their selection. In the next step, in order to codify the texts, 35 books were introduced which were observed from 27 repetitions in received information. According to principles of grounded theory, data was collected and analyzed after investigating the initial contents of the books.

Table 3 Extracted books by experts for extracting texts

Book Name	Year	Author	Book Name	Year	Author
The Philosophy of Christian and Oriental Art	2007	Amir Hossein Zekrgou	Pseudo-Dionysius: The Complete Works	1988	Pseudo Dionysus
The Philosophy of Medieval Ages and The Orient Art	2007	Saleh Tabatabai	Re-thinking Dionysius The Areopagite	2009	Sarah Coakley
Preface on The Philosophy of Medieval Ages	2004	Masoud Olia	Dionysius The Areopagite and The Neoplatonist Tradition: Despoiling The Hellenes	2013	John Dillon
Plato-the Tomplete Works (4 volumes)	2001	Mohammd Hassan Lotfi	Pseudo-dionysius as Polemicist: The Development and Purpose of The Angelic Hierarchy in Sixth Century Syria	2008	Rosemary A. Arthur
Art and Beauty in Medieval Ages	2002	Farideh Mahdavi Damghani	Dionysius and The History of Archaic Rome	1991	Emilio Gabba
The History of Philosophy in Medieval Ages and Renaissance	2007	Mohammad Ilkhani	Dionysius	2006	Andre Belair
A Discussion in Christian Philosophy and Speech	2001	-	Hierarchy and The Definition of Order in The Letters of Pseudo-Dionysius: A Study in The Form and Meaning of The Pseudo-Dionysian Writings	1868	Ronald F. Hathaway
Philosophy in ancient	2001	Abdorrahim Soleimani	The Literary Treatises of	2013	S. F. Bonner

Book Name	Year	Author	Book Name	Year	Author
Christianity		Ardestani	Dionysius of Halicarnassus: A Study In The Development Of The Critical Method		
Comparative hermeneutics	2005	Ghasem Pourhassan	Dionysius the Areopagite on the Divine Names and the Mystical Theology	2007	Clarence E. Rolt
Criticizing west philosophical thought from medieval ages to the beginning of the present century	2001	Ahmad Ahmadi	Dionysius the Areopagite between Orthodoxy and Heresy	2011	Filip Ivanovic

5.2. Quantitative Sampling

In the next step, different variables extracted in the form of closed questionnaire with five point Likert scale answers based on the extraction of different texts which have been written about Pseudo Dionysus. The structure of questionnaire includes questions in relation with research main questions; that is which one of the beauty markers in Dionysus' works has had the most effect and the questions are in line with answering this question. In order to do the calculations, experts considered score 5 for "the most effect" and score 1 for "the least effect" and to save time and cost questionnaires distributed via internet among the random sample of experts statistical population familiar with beauty and Dionysus domain. Sample size selected by means of Morgan table which includes 376 individuals who were distributed randomly according to population and separation of male and female in universities. The following diagram shows the general process of research.
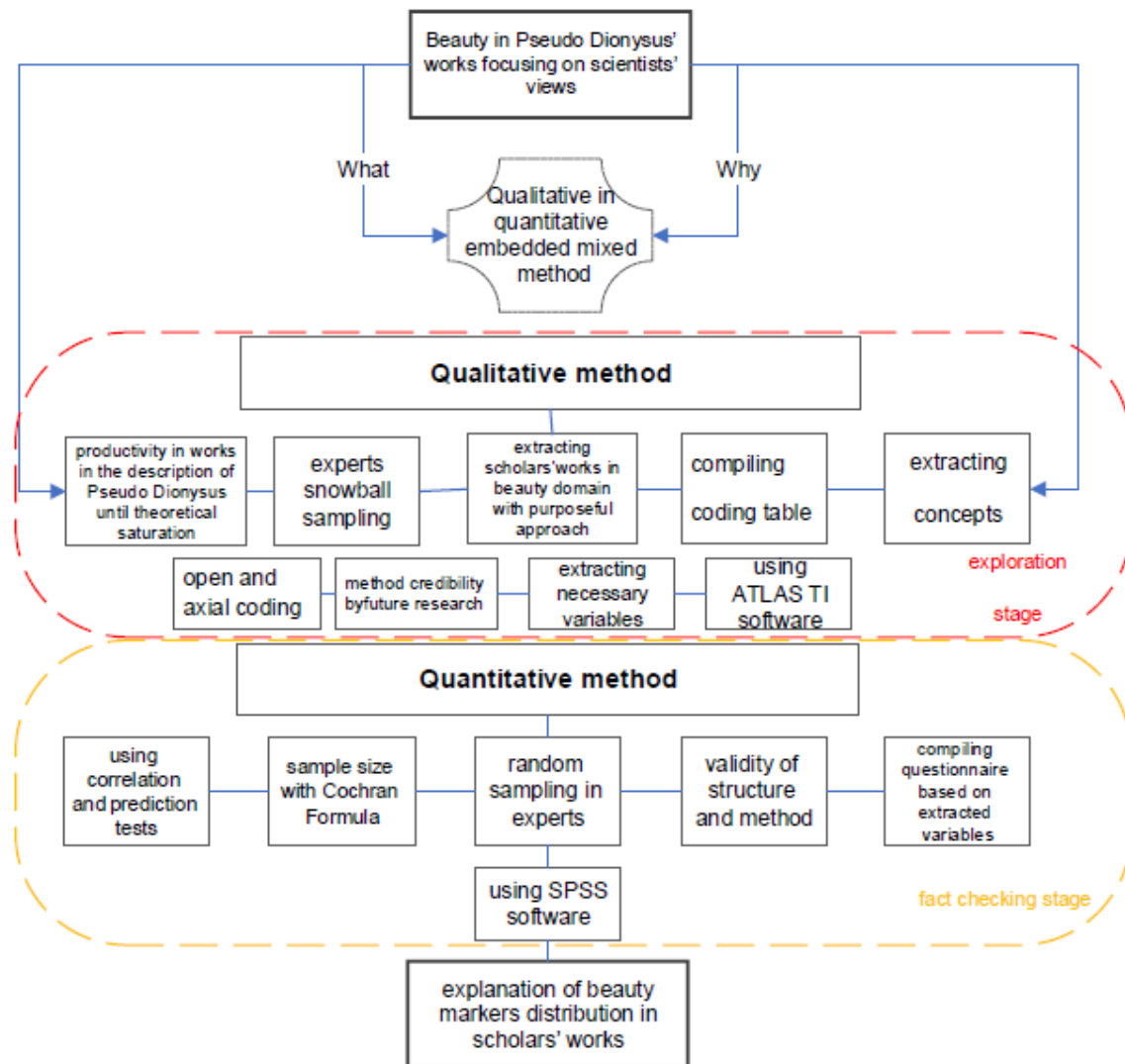
Fig 1 Research process (Source: Authors)

6. Findings

6.1. Qualitative Findings

In qualitative section first experts were asked to select some books among different introduced ones based on their observations and also research questions and subject. The number of 20 books was extracted and all texts related to Dionysus and definitions of books compilers from Dionysus and beauty were live coded and then were axial coded to the category of this study and also research questions. First 45 open codes and 34 axial codes were extracted. The important point was that after the 16th book extracted codes were repetitive and results gained theoretical saturation.
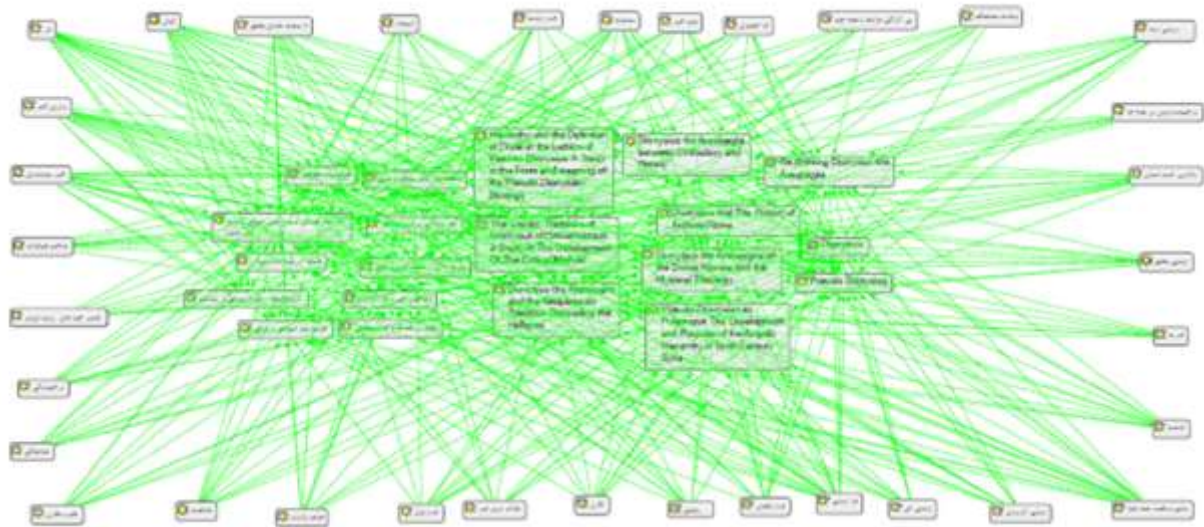
Fig 2 Extracting beauty markers by open coding and axial coding by means of ATLAS-ti (Source: Authors)

In the following the number of extracted codes and each of extracted markers and the number each of them has been extracted from different books are represented and it is concluded that the most distinguished codes are: ultra-beauty, the source of everything, goodness and usefulness, perfection, the best goodness, equality, among absolute God's epithets, the highest purpose of human, symmetry, appropriateness, omitting wastes, creativity, light, idea beauty, absence of deterioration, absence of deficiency, the most attractive affairs, brilliance, applied beauty, total beauty, absolute beauty, the owner of blessings, absence of excess, ultra-substantiality, order and symmetry, the appearance of goodness, coordination, the image of visible things, coordinated unity, infinity related to everything, power and brilliance everywhere.

Table 4 Extracted conceptual codes (beauty markers) and the number of repetition in different books

Extracted Marker	Among absolute God's Epithets	Integrity	The Highest Purpose of Human	The Best Goodness	Infinity Related to Everything	The Image of Visible Things	Symmetry	Appropriateness	The Most Attractive Affairs
The Number from the Whole Books	14	11	12	15	7	8	10	10	9
Extracted Marker	Omitting Wastes	Creativity	Goodness and Usefulness	Brilliance	Brilliance Everywhere	Light	Idea Beauty	Applied Beauty	Total Beauty

The Number from the Whole Books	10	10	17	9	6	10	10	9	9
Extracted Marker	Absolute Beauty	Coordinated Beauty	The Owner of Blessings	Absence of Deterioration	Absence of Excess	Absence of Deficiency	Ultra-Substantiality	Ultra-Beauty	Power
The Number from the Whole Books	9	8	9	10	9	10	9	17	7
Extracted Marker	Perfection	Equality	The Source and Goal of Everything	Order and Symmetry	Goodness Appearance	Light	Coordination	The most distinguished: ultra-beauty and the source of everything, goodness, usefulness, perfection, the best goodness, equality	
The Number from the Whole Books	16	14	17	9	9	15	9		

6.2. Quantitative Findings

According to descriptive statistics, sample population included 253 (72.1%) males and 98 (27.9%) females and most of them were art and philosophy professors. Here extracted markers from different book are analyzed. The procedure is that question (5 questions) is developed for the number of each factor's markers and each question has an answer with 1 to 5 range. The scores sum of each factor's indices means the point that each person has given it to each beauty marker in Dionysus' works. So the acceptable score for each quality is between 5 and 25 variables. Accordingly a category is made so that individuals who have scored 5 to 11 to a factor evaluated it weak, those who scored between 12 and 18 evaluated it medium and those scored between 19 and 25 considered it good. The following frequency diagram shows the most important beauty markers. Based on frequency distribution, light, among absolute God's epithets, source and goal of

everything and perfection had the most frequency and the least frequency related to brilliance, idea beauty, applied beauty, infinity and related to everything.
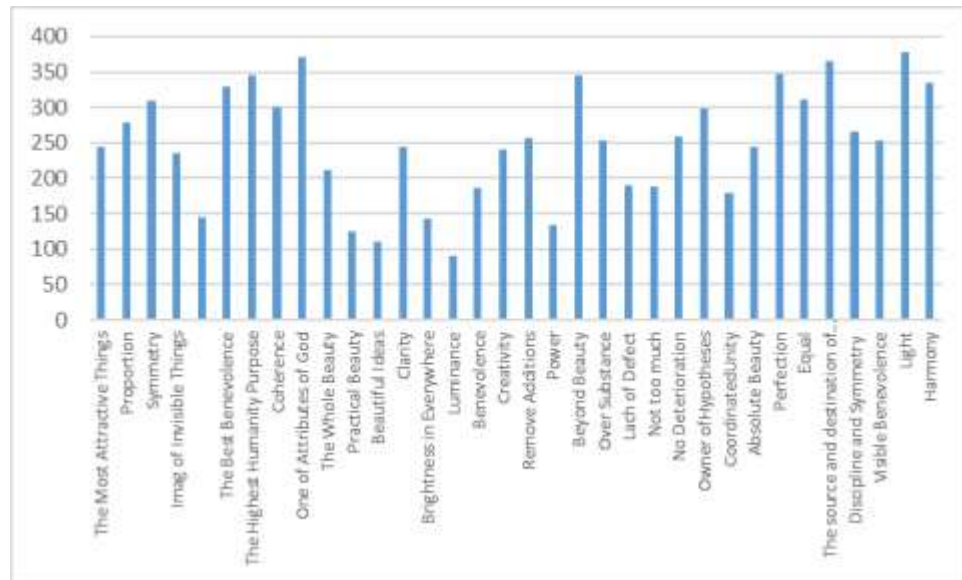
Fig 3 Frequency distribution of beauty markers from experts' point of view (Source: Authors)

In the other words, each of markers with higher mean and lower Coefficient of Variation (CV) is nearer to utility and it is possible to consider it as weakness or strength point. So mean, Standard Deviation (SD) and CV parameters are necessary. SPSS calculates means and SD, but CV has to be calculated manually and by means of the following formula.

$$0.1 < \text{CV calculation formula} = (\text{SD} / \text{Mean}) < 1$$

Multivariate regression includes independent variable into or excludes it from each stage to achieve the optimal model at last. The above formula shows that increasing to and decreasing one unit from beauty markers and stabilizing other factors, the existing variables are influenced differently which integrity, creativity, ultra-beauty, absence of excess, coordinated unity, perfection, source and goal of everything and light with 1 determination coefficient had the most influence and then idea beauty (0.893%) and symmetry (0.846%) followed them and absence of deficiency (0.427%) and goodness appearance (0.457%) had the least influence and light and power with (0.467%) determination coefficient followed them. Other markers had medium determination coefficient.

Table 5 Each of extracted markers stepwise regression in qualitative section

Scale	Determination Coefficient	F	B	β	T	P-value	Degree of Freedom
The Most Attractive Affairs	0.615	527.222	1.000	0.781	46.552	0.000	383
Appropriateness	1.000	405.122	1.000	0.732	42.152	0.000	383

Symmetry	0.846	217.343	1.000	0.662	40.223	0.000	383
Image of Invisible Things	0.746	199.943	1.000	0.648	38.239	0.000	383
Infinity related to Everything	0.762	201.612	1.000	0.664	8.958	0.000	383
The Best Goodness	0.383	643.623	1.000	0.662	11.134	0.000	383
Human's Highest Purpose	0.753	849.683	1.000	0.652	18.441	0.000	383
Integrity	1.000	349.603	1.000	0.665	19.144	0.000	383
Among Absolute God's Epithets	0.571	184.945	1.000	0.483	49.173	0.000	383
Total Beauty	0.770	276.748	1.000	0.464	47.963	0.000	383
Applied Beauty	0.795	199.943	1.000	0.452	46.226	0.000	383
Idea Beauty	0.893	499.034	1.000	0.643	47.228	0.000	383
Light	0.467	673.643	1.000	0.662	21.341	0.000	383
Brilliance Everywhere	0.750	489.782	1.000	0.720	25.215	0.000	383
Brilliance	0.674	489.782	1.000	0.543	19.215	0.000	383
Goodness Usefulness	0.567	489.782	1.000	0.420	18.215	0.000	383
Creativity	1.000	382.412	1.000	0.663	20.321	0.000	383
Omitting Wastes	0.732	656.782	1.000	0.410	25.876	0.000	383
Power	0.467	673.634	1.000	0.662	21.341	0.000	383
Ultra-Beauty	1.000	645.715	1.000	0.720	25.215	0.000	383
Ultra-Substantiality	0.674	546.712	1.000	0.541	19.215	0.000	383
Absence of Deficiency	0.427	318.732	1.000	0.394	18.215	0.000	383
Absence of Excess	1.000	382.412	1.000	0.663	20.321	0.000	383
Absence of Deterioration	0.732	656.782	1.000	0.410	25.876	0.000	383
Owner of Blessings	0.496	673.643	1.000	0.662	21.341	0.000	383
Coordinated Unity	1.000	645.715	1.000	0.720	25.215	0.000	383
Absolute Beauty	0.674	546.712	1.000	0.541	19.215	0.000	383
Perfection	1.000	1.000	1.000	0.663	20.321	0.000	383
Equality	0.782	0.782	1.000	0.410	25.876	0.000	383
Source and Goal of Everything	1.000	1.000	1.000	0.663	20.321	0.000	383
Order and Symmetry	0.632	0.632	1.000	0.410	20.876	0.000	383

Goodness Appearance	0.457	0.457	1.000	0.662	21.341	0.000	383
Light	1.000	1.000	1.000	0.720	25.215	0.000	383
Coordination	0.634	0.634	1.000	0.541	19.215	0.000	383

7. Conclusion

Pseudo Dionysus is one of the influential philosophers in different fields of art and many pupils have had role in dissemination of his thoughts. Investigating written books by scholars and extracting markers from texts by means of grounded theory method revealed that besides the thoughts of Plato and Socrates other philosophers also influenced on his thoughts. Ultra-beauty, source of everything, goodness and usefulness, perfection, the best goodness and equality markers as the most repeated ones mostly belong to the works of Plato and Socrates. Markers such as appropriateness, symmetry, the best goodness and…are common in all philosophers' works but order and symmetry, equality, coordination markers demonstrate the thought of other philosophers on pseudo Dionysus' works, maybe this is due to the expansion of Dionysus' thoughts by his pupils. Generally, extracted and repetitious markers resultant from scholars' works are as follow:

Pythagoras < Aquintes < Aquinas < Aristotle < Plato and Socrates

But according to quantitative results extracted from experts' works based on asking academicians dependent on philosophy and art the result are more different which markers like integrity, creativity, ultra-beauty, absence of excess and…have been more which is demonstrative of other philosophers' effects on Dionysus' works. According to the results from Table 5, the orders of influences on Dionysus' works are as follows:

Aquintes < Aristotle < Aquinas < Pythagoras < Plato and Socrates

There are common views in both methods and extracted results on the influences of Plato and Socrates but there are difference in the order of other philosophers which is due to the incorrect reading of sources by scholars for description and interpretation of Dionysus' works. Also there are two general concepts in Dionysus' aesthetics, religious concept of God which is derived from holy books and the absolute philosophical concept which belongs to the Greeks and exits in all books related to different philosophers and most authors agree with the integration of these two concepts by pseudo Dionysus. He considered materialistic analytical aspects of Greek philosophy for beauty and also from his inspired aspects in his works it is possible to refer to his excessive affectivity from Plato and Plotinus. The important point is that Dionysus was influenced by other philosophers and the present study refers to the order of affectivity by other scholars. It seems that he has taken the superiority of spiritual and exemplar beauty doctrines to experimental beauty and also beauty in absence and purpose from Plato and beauty doctrines as the epithet of absolute matter that is the beauty related to goodness and absolute beauty benefit from Plotinus.

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Visual Design Principles of Ancient Art

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Abstract

This work presents an important investigation of design basics and the golden proportional model in Persian painted pottery motifs (late fifth-early fourth millennium B.C.) and presents a comparison among Persian, Egyptian and Grecian fundamental design basics. Generally, Persian, Egyptian and Grecian pottery motif designs have some similarities and dissimilarities in their design basics. It can be concluded that the employed elements are nearly the same for all the investigated civilizations. The techniques used to achieve the principles in Persian studied designs have been understood to be either design of Egyptian painted motif like or Grecian motif design like. The used golden proportional models were found to have distinctive variations for the different civilizations. Persian has a higher degree of diversity in golden proportional models compared resulting in more well performed/pleasant designs.

1. Introduction

Since the early times, mankind gazed at nature and around world; countless artistic artworks have been created. In their mind, they had many designs for creating and every designer was inspired by nature. Designer created his works based on his beliefs and the place where he lived. Designer attempted continually for representing nature shapes in abstract and geometric styles. Animal motifs in the ancient civilizations of Persia, Greece and Egypt played important role in life of ancient people, religion, ritual and sacrificial rites for the goddess. Indeed, animal and human motifs had been objects to reach the fertility, fruitfulness, survival and warding off from evil. Ancient artworks were a creative solution for the mentioned desires. These designs seek to visual

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communication to the viewer to give a message as content of a design. Designer employed elements arranged by principles for establishing a visual communication. Recognizing the techniques employed by Persian ancient artists (based on modern element and principles definitions) to achieve principles of design is very important in concept of design history, because our knowledge about this subject has not yet been completed, especially for the Porto-Elamite and Elamite eras (ca. 5000-2600 B.C.) where the earliest painted potteries can be found.

In addition, one of the characteristics of observed Proto-Elamite/ Elamite motifs is existence of the pleasing relationships between the design components. It seems that effective design principles and proportional models incorporated with the golden number as, a simple practical mathematic idea, were employed. Also there are long historical relationships between Art and Mathematic ideas and geometry (Le-Corbusier, 2008; Gottschall, 1989; Muller-Brockmann, 2003). The importance of mathematics ideas in art is stated by Max Bill (1949); "I am of the opinion that it is possible to develop an art largely on the basis of mathematical thinking" (Kimberly, 2011). Golden proportion as a universal law (Zeising, 1854) plays a fundamental function in the natural structure blocks (Browm, 2003) and creates pleasing relationships.

Ancient peoples thought that the golden proportion was created by God and it exists everywhere in the nature (Benjafield, 2010; Browm, 2003). Since ancient times, the principle of the proportion has been employed (Green, 1995) such as in the Sumerian arts, in Egyptian great Pyramid (Burton, 1985; Gardner, 1957; Westren Turnbull, 1956), Greek vases, pottery of Chinese and Cretan (in French) and Mycenaean (in Greek) products of the late Bronze Age (3100-2200 B.C.). Greek religious buildings have been designed based on an approximation of φ with the accuracy around 0.5% (Green, 1995). Due to the simplicity of the structure and application, the golden proportion has a considerable impact on the art and architecture of the middle ages and the Renaissance (ca. 1350-1600) (Elkins and Williams, 2008). Phidias is aware of the aesthetics of the golden proportion in constructing the Parthenon and occurrence of the golden ratio in the Parthenon is frequently reported (Browne, 1989; Bergamini, 1963; Hill, 1990; Hude, 1974; Manuel and Santiago, 1988) (Pappas, 1989; Mitchell, 1977).

The majority of the investigations to recognize the golden dividing have been conducted on the Greece, Egypt civilizations and European art in medieval period where the earliest studied evidences belong to Bronze Age about 3000 B.C. and the employing of this idea is proofed. In spite of that, has not been paid an attempt on recognizing of design basics and the golden-based model on Persian painted pottery motifs derived from Neolithic and Early Bronze ages (ca. 8000-2000 B.C.).

Existence of pleasing relationship, high degree of aesthetics, and a visual coherence in Elamite era shows there could be a cognitive preference for pleasing ratios as inspired by nature. It can be hypothesized that the designer used near or equal values to Golden ratio for element organization in their design and was aware of its existence and features. The objectives of this study are; Understanding how ancient Persian designers achieved design basics; Making clear the position of the art of ancient Persia in the history of golden ratio; and Recognizing the similarities among Persian, Egyptian and Grecian fundamental design basics.

1.1. Terminology of Golden Ratio

The golden proportion is called the "fundamental building blocks" in the natural world (Browm, 2003) but, it is not exactly identified who, for the first time has proposed the golden section concept. However, golden proportion is attributed to Pythagoras (ca. 570-495 B.C.) and Plato (ca. 428–427 B.C.), a student of Socrates, (Naini, James, and Daljit, 2006). The golden ratio According

to Euclid (ca. 325–265 B.C.) is the "division into mean and extreme ratio" (Heath, 1956; Berlyne, 1971; Herz-Fischler, 1998). Euclid in his well-known book entitled with "Elements" explains the calculation method of golden ratio (Devlin, 2005). Leonardo of Pisa, known as Fibonacci, (ca. 1170-1250) presents a series of numerical that is called the "Fibonacci sequence". This sequence number begins with 0 and 1 then each successive number obtains by sum of prior consecutive two numbers like 0, 1, 1, 2, 3, 5, 8, 13, ... There is a strong relationship between this successive ratio of this sequence and the golden proportion (≈1.618) (Dunlap, 1997). Johannes Kepler (1571-1630) demonstrates that the limit of the Fibonacci sequence is approximately equal to the golden ratio (Tattersall, 2005). Luca Pacioli, (1509) in the 16th century, uses the expression of "de divina proportione" in his book that focuses on the golden section, illustrated by Leonardo da Vinci (Crosby, 1998; Pacioli di Borgo, 2004; Kemp, 2004). Maestlin (1597) first purposes the famous golden ratio decimal calculation (Herz-Fischler, 1998). The golden ratio is often represented by other researchers as the golden section[†] (Coxeter, 1953), the golden number (Fischler, 1981), golden mean (Linn, 1974), divine proportion (Huntley, 1970), the Fibonacci number (Dunlap, 1997) and mean ratios (Smith, 1953). The sign of Phi (φ) has been taken from the first alphabet of the name of Phidias (ca. 490 BC–430 BC) who is one of the most famous ancient Greek sculptors and architects (Fowler, 1982).

2. Materials and Methods

The methodology is subdivided into 3 parts including analysis of design basics (Formal analysis), the proportional analysis and comparison. The same design basics and proportional analysis were done on the some earliest observed painted pottery motifs of Egypt and Greece civilizations to be compared with Persian motif designs. Fifty-nine ancient painted potteries (ca. 5000-2600B.C.) are examined and after ignoring repetitive and indistinct figures, a total of 38 motifs designs were selected. For comparison part, a total of 66 painted potteries were examined for the Egypt and Greece civilizations. The sources to find motifs were documents, interviews of experts in the ancient art of Persia and golden proportion, observations from libraries, research centres and museums visit (in person and virtually). Documentations and archival evidences such as books, articles and excavation reports used to provide background of the research and to highlight the gap of knowledge on this subject.

2.1. Studied Eras and Area

For ancient Persia, painted pottery motifs belong to the late fifth-early fourth millennium B.C. to 2600 B.C. or Proto-Elamite classified into three sub-periods of Period Susa I. (ca. 5000-3500), Period Susa II (ca. 3500-3100 B.C) and period Susa III (ca. 3100-2600 B.C.) (Figure 1a). For comparison section, the observed earliest Egyptian and Greece painted potteries cover the periods of ca.3650-3300B.C and ca.2500-1300B.C., respectively. The Egypt studied period is contemporary with the Pre-dynastic era ancient Egypt timeline (ca. 5300-2950B.C.). For Greece civilization, the study period is contemporary with the Late Bronze Age, ca.1600-1050B.C. (Mycenaean culture) and a small part of the Early Bronze age (ca. 3200-2000B.C.) of the ancient Greece timeline (Figure 1a).

[†]. in Latin names *sectio divina*

2.2. Term of Susa

This research deals with design motifs observed from Neolithic and Early Bronze ages excavated from Susa as ancient Persia civilization and the capital of Elamite (5000–650 B.C.) as well as the economic and cultural capital of Achaemenid empires (559–330 B.C.), located at west south Iran, around 1.17 km northwest of Ahwaz modern city. Today Susa city is located at the same place after 7000 years.

2.3. Formal and Proportional Analysis

Identification and explanation of elements and principles were done based on the definitions presented by (Hashimoto and Clayton, 2009; D'alleva, 2006; Feldman, 1972). The Kimberly Elam's geometric approaches (Kimberly, 2011) are used for constructing golden models based on the ratio of 1.618. To find used techniques, the remarks and definitions presented by (Pentak and Lauor, 2015) were used.
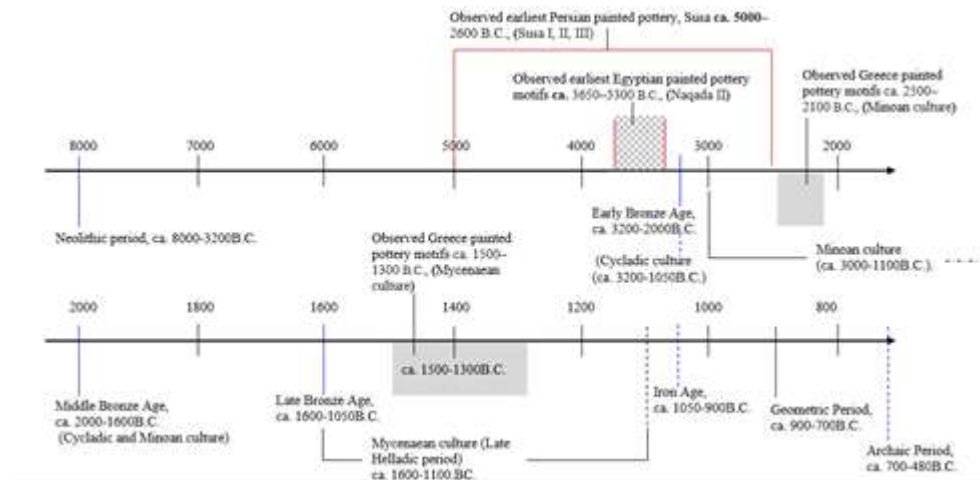
3. Results and Discussion

The animal and human motifs are the main subjects in motif designs. A variety of animals on the painted potteries in different civilizations is observed (Figure 1b). The most repeated animal motifs are Ibex, bird and horse in Persia, Egypt and Greece, respectively. The presence of animal and human motifs on ancient painted potteries is expected, because in all the ancient civilizations, animals play a key role in daily living of people. In Egyptian and Grecian motif designs there are not a given symbol associated with the motif compared to Persian motif.

Results of elements analysis show that most lines were straight, bold and rigid in diagonal and vertical directions. A difference in the used lines thickness is seen (Figure 1b). It is interesting that the ancient Persian and Egyptian designers used the diagonal and spirals dominant orientations to illustrate the feeling of flowing and present the motion (Figure 1: P7, 13, 25, 26, 28; E30, 32, 33, Figure 2: b2, b3). There are a number of Egyptian painted potteries including just spirals motifs. The vertical lines were drawn to show a feeling of more stability in design while diagonal lines were used to present a sense of dynamism and moving feeling. In Persian motifs designs the dominant vertical direction is frequently observed (Figure 1: P1-4, 14, 18, 22, 23), while in Greece and Egypt diagonal and spiral direction are dominant. Persian motifs mostly have clear boundaries between elements and if all the contours are traced, there will not be any confusion. In addition, curving forms used to emphasize on natural shapes such as horn and body of animal and to give a sense of softness and flowing (Figure 1: P1-4, 7, 10, 26, 28, E:24, 29, 32, G36-38). Combination between curvilinear and rectilinear forms in which one of them was dominant created the focal area (Figure 1: P1-4, 11, 15, E31, 33, G39). All motifs created monochrome or silhouette associated with using efficient negative space. Negative spaces in some studied motifs have had an equally importance in comparison with the subject matter. For example, designer used positive and negative space (square) to create a pattern to design the symbol of farm land (Figure 1P: 1, 4, 11). In all designs the object and background (yellow, brown, black and red color) can obviously be distinguished.

Principles of balance, repetition, contrast, harmony, unity, emphasis and dominance were found on the studied designs. The dominant balance had been symmetry and near-symmetry in Egypt and Persia civilization with horizontal and vertical axes (e.g. Figure 1: P1-6, 9, 10, 14-17, 19, 21-23, 27). The radial balance is observed on Persian painted pottery motifs, results in closeness and unity.

(a)

(b)

P1; Ibex; 4000BC. (Root 2005)

P2; Ibex; 5000BC. (Parrot 1960)

P3; Ibex; 4000BC. (Clibborn, et al. 2001)

P4; Ibex; 5000-4000 BC. (Dury 1969)

P5; Ibex; 4500BC. (Ayatollahi 2003)

P6; Sheep with sign of irrigation

P7; Stork; 4500BC. (Ayatollahi 2003)

P8; Snake; 5000-4000 BC. (Root 2005)

P9; Sheep with symbol of water; 4000BC. (Root 2005)

P10; Stork; 4500BC.

P11; bird-comb, sing of earth; 4000BC. (Parrot 1960)

P12; Chalipa; 4500BC. (Pope 1967)

P13; scorpion ;5000-4000 BC. (Root 2005)

P14; tortoise; 4000 BC. (Root 2005)

P15; Dog and Horse; 4500 BC. (Hole and Wyllie 2007)

P16; Ibex; 5000BC. (Parrot 1960)

P17; Stylized Ibex; 3000BC.

P18; Crane; 5000BC. (Parrot 1960)

P19; Vulture; 4000BC. (Root 2005)

P20; Vulture; 4500BC. (Pope 1967)

P21; geometric Vulture; 4000BC. (Root 2005)

P22; Human; 5000-4000BC. (Root 2005)

P23; Human; 4000BC. (Parrot 1960)

P24; Ibex, Sheep, Wolf 4500BC. (Pope 1967)

P25; Dog; 5000BC. (Parrot 1960)

P26; Dog; 4500BC. (Ayatollahi 2003)

P27; Domestic Sheep; 4500BC (Pope 1967)

P28; Human-irrigation sign 4000BC.

E29; Hippo; ca.3650–3500 B.C.

E30; Human; ca. 3650-3300BC.

E31; Hippo; ca.3650–3500 B.C.

E32; Deer; ca. 3650-3300BC.

E33; Partridge; ca. 3450–3350 B.C

E34; Human; ca. 3450–3300 BC. Metropolitan Museum   E35; Deer; ca. 3650-3300BC.   E36; Goat; ca. 3500–3300 BC.   E37; Horses of Chariot, ca. 1400–1370 B.C   G38; Human; ca. 1500-1300 B.C.   G39; Flamingo, ca. 3650–3300 BC.   G40; Dog; ca. 2500-2100 BC. Athens National Archaeological Museum
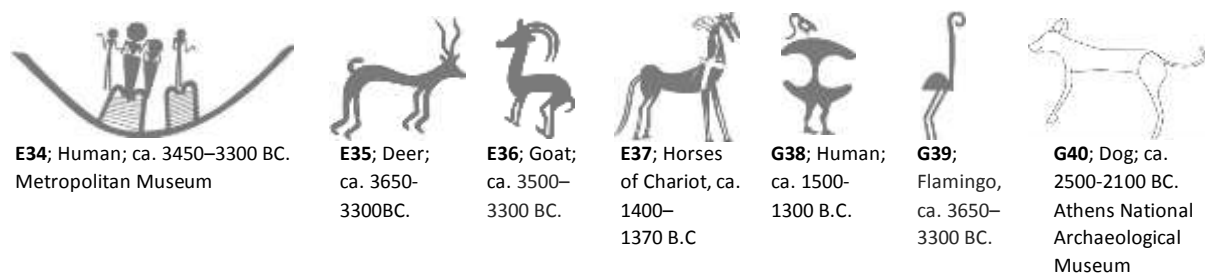
Figure 1 Comparative chronological chart, the earliest painted pottery motifs in different civilizations observed, gray zone refer to Greece (ca. 2500-1300B.C.), (Based on (Mcintosh, 2009; Neer, 2011; Pedley 2007, Perlès 2001, Béatrix 2000), Hatch area refers to Observed earliest Egyptian painted pottery motifs ca. 3650–3300 B.C., (Naqada II) (based on (Mcintosh, 2009; Roger and Klaas, 2004; Dorman, Russmann and Lilyquist, 1983; Lioyd, 2004; Béatrix, 2000), (b) selected studied motifs, Abbreviation: [First letter of Civilization][motif number]; like **P**=Persian.

Symmetrical balance as the simplest type of balance represents the feeling of permanence, stability and strength. Ancient Persian designers position the visual importance area (like symbols of earth and fertility) or focal points on the central axis of design where symmetrical balance can be found (e.g. Figure1: P1-4, 6, 9); while this characteristic is not observed in Egyptian and Greece motif designs.

The repetition of element was one of the main principles in all investigated civilizations. Repetition of line with variation in size is observed in all studied civilizations to form a rhythmic feeling (Figure 1: P10, 11, 19, 20), movement (e.g. Figure 1: P11, E32-33) and illusion of depth (Figure 1: P1-5, 24-26, 28, E29-31, 34-37, 40, G40).

The repetition of lines and forms is applied to achieve the principle of overall unity (e.g. Figure 1: P29, 31, E33). Ancient Persian also employed the closeness and continuation techniques (e.g. Figure 1: P1-4, 8, 12, 15, 24) to present the visual unity into while, closeness is rarely observed in Grecian and Egyptian painted potteries. Also, visual spiral direction on the whole design created unity and a visual linkage amongst the elements. For Persia, Egypt and Greece, superimposed golden spirals on the motif designs have good coincidence, implies the occurrence of continuation (e.g. Figure 2: b1, b2, b3; Figure 3: d1, d2, d3).

Persian designers used the methods of exaggeration (e.g. Figure 1: P1-5, 11), the positive and the negative spaces placement (e.g. Figure 1: P1, 4, 11), curved and angled shapes arrangement (e.g. Figure 1: P1-5, 11, 15) and viewpoint changing (e.g. Figure 1: P7, 10, 18, 22-26, 28) to achieve the emphasis. Through changing in form and size break the overall design pattern (e.g. Figure 1: P6, 9) to achieve the emphasis principle. Ancient Egyptian and Persian designers, utilized methods of pattern breaking, size variation and viewpoint change to present a visual emphasis while in studied Grecian motifs changing the viewpoint was not seen.

In Persia, depth illusion or space is formed using the techniques of repetition with difference in size, multiple view point and oblique projection (Figure 1: P26, 28). Multiple viewpoints include side-plan (Figure 1: P7, 10) and side-front views (Figure 1: P18, 22, 23). Egyptian artists used similar techniques except oblique projection (Figure 1: E31-34). Grecian artists applied the repetition with variation in size to present a feeling of depth (Figure 1: G38-40).

4. Proportional Analysis

Overall, proportional analysis indicates that in Persia and Egypt a variety in golden proportional models is observed both in the vertical and horizontal directions. Proportional models of [1:φ], [1: φ: φ^2] (Figure 2: a2, a6-a8, a10, a12) and [1:φ: φ^2: φ^3: φ^4] (Figure 2: a5) were found in horizontal direction on Persian motifs. The golden vertical proportional models of [1:φ], [1: φ: φ^2] (Figure 2: a2, a3, a11), and [1: φ: φ^2: φ^3: φ^4] (Figure 2: a7) are seen in Persian designs. It is interesting that the focal points (as symbols like earth, fertility, water) were localized based on the closed golden proportion models (Figure 2: a1-a4, Figure 3: a1).

In the same way, in Egyptian motifs the golden models of [1:φ], [1:φ:φ^2] (Figure 3: b1, b2, b5, b6), [1: φ: φ^2: φ^3] (Figure 3: b3, b7) and [1:φ], [1:φ:φ^2] (Figure 3: b1-b2, b5-b7) are recognized in vertical and horizontal directions, respectively. In Greece the horizontal golden proportional models of [1:φ], [1: φ: φ^2] (Figure 3: c1, c2) and [1:φ: φ^2: φ^3] (Figure 3: c3) and vertical models of [1: φ: φ^2] (Figure 3: c1, c2), [1: φ: φ^2: φ^3] (Figure 3: c3, c4) and [1: φ: φ^2: φ^3: φ^4] (Figure 3: c2) were observed.

It can be concluded that the ancient designers applied the golden proportional models to achieve satisfying relations amongst elements. A well agreement exists between golden proportional models and position of the focal areas on design for Persia.

Generally speaking, results can increase body of our knowledge regarding to the basics of design and existence of golden proportion on motifs in ancient Persia, the late fifth-early fourth millennium B.C. to 2600 B.C. This research highlights the role of art of ancient Persia in history of golden proportion and presents some clues for existence and application of the golden proportion in ancient Persia.

Figure 2 Selected motifs; (a1-a12) existence of golden-based proportional models in the studied painted potteries derived from ancient Persia, (b1-b3) selected results to show relatively good agreement between golden spirals and element of motif designs.

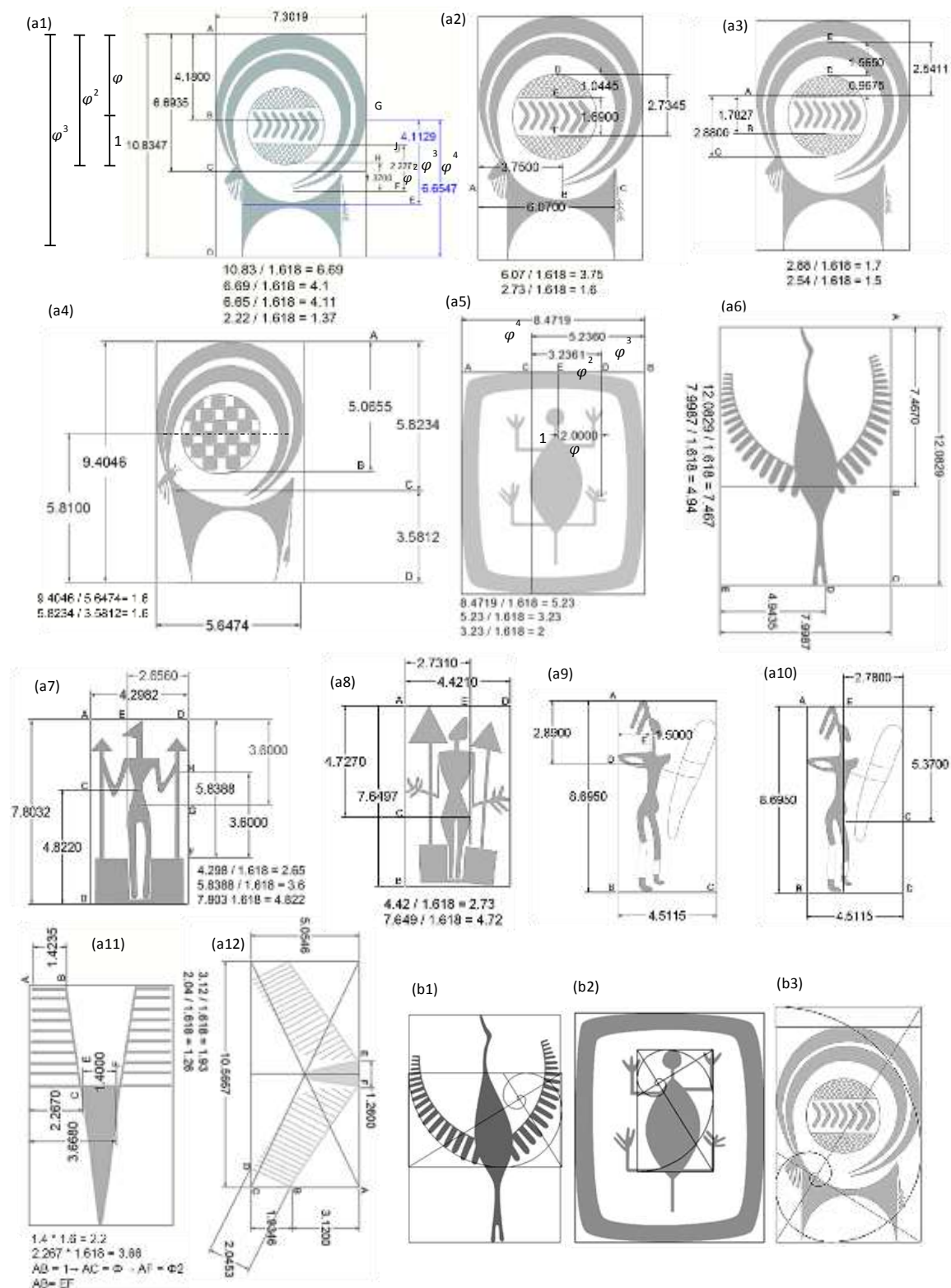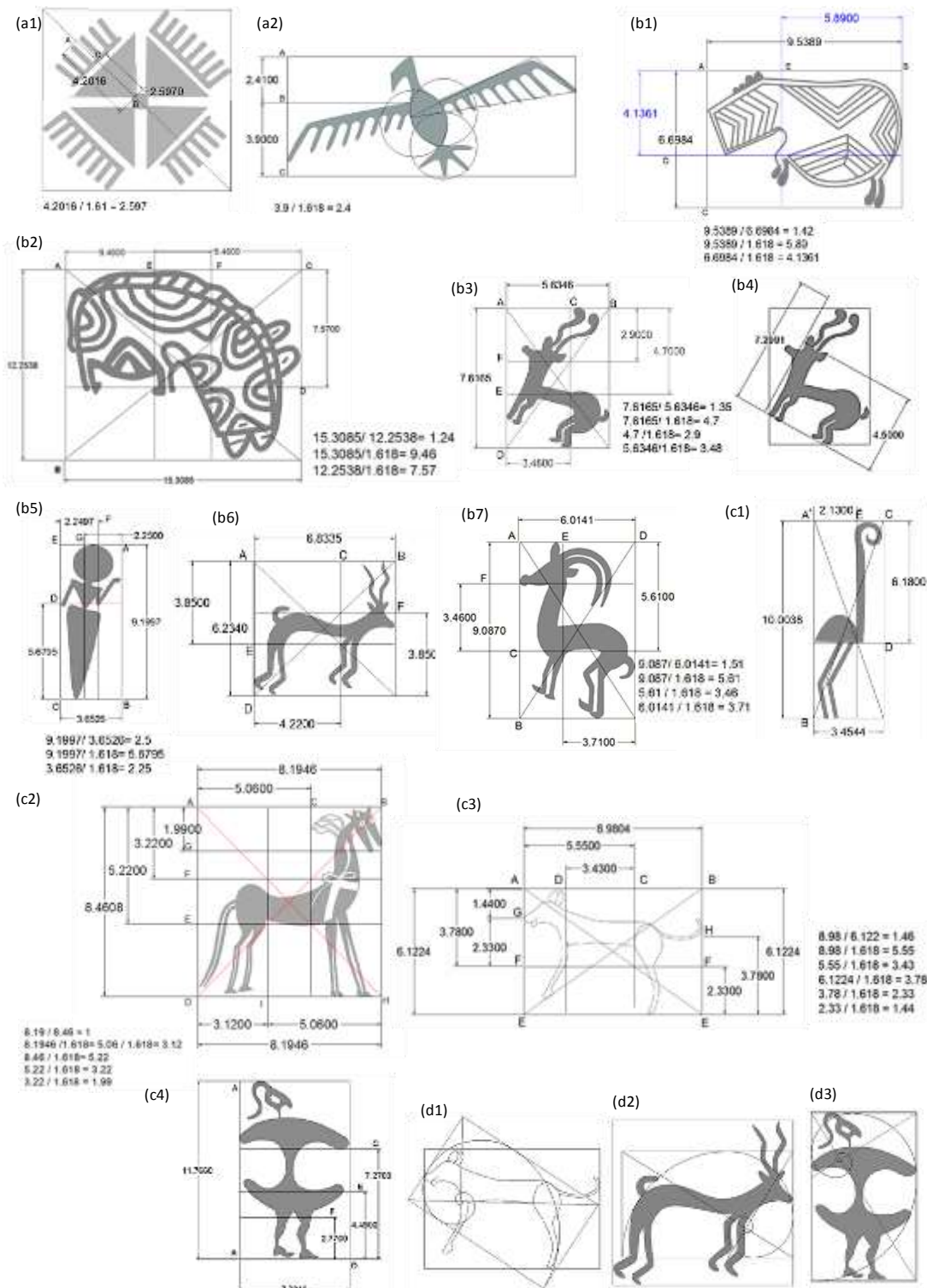**Figure 3** Selected results; (a1-a2) existence of golden-based proportional models in the painted potteries derived from ancient Persia, (b1-b7) golden proportional models in Egyptian motif designs, (c1-c4) golden proportion in some Grecian motif designs, and (d1-d3) selected results to show relatively good agreement between golden spirals and whole work of designs.

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Pre-Islamic Painting in India: A Case Study of Painting Styles

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Abstract

India is a land of rich historical, cultural and artistic background. Painting has long been popular in India, and pre-Islamic paintings of caves and paintings from pre-Islamic India show interest in the art of Portrait painting and painting. Paintings from ancient times have been reported from inside caves and stone walls And most of the historical information about the art of painting in India, is the remaining caves in Ajanta Cave. Undoubtedly, cave paintings have influenced the evolution of painting in later periods and created a variety of styles and schools of painting in the Hindu period, which is one of the artistic masterpieces of its time. The purpose of this study is the art of painting in India, the formation of different styles of painting in pre-Islamic India, the subject of paintings and the position of women in paintings. This research method describes pre-Islamic painting in India and analyzes different styles of painting based on drawings. The results of the research show that painting has been considered in India from the beginning as cave paintings and murals, and various painting styles are influenced by cave paintings and arise from mystical, religious and moral issues. Every day and different issues were created using various designs and colors and the presence of elements of nature. From the beginning of women's painting in the caves, women's painting has been depicted in the form of numerous goddesses and in later periods by drawing goddesses, queens, princes and other women in Hindu painting styles.

Keywords: Indian Painting; Cave Paintings; Painting Styles; Pre-Islamic India

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1. Introduction

Most Indian paintings are murals of the Ajanta caves. These caves have murals from the first century BC to the fifth century AD. Painting in ancient India was quite an advanced art, even the palaces of kings and the homes of the rich were decorated with murals, and usually smaller paintings were painted on the boards. Not only were professional artists in painting, but there were also many educated men and women who could paint well. Among the paintings, we can mention the temple wall painting caves. The walls of the cave were first plastered and, after design, painted with mud-colored ocher pigments and mineral and azure dyes with bright colors, as they do today in Hindu temples. In the corners of the temples, masterful designs of paintings and wall decorations have been used.

In the cave paintings, the painters depicted the moral and mystical aspects of Buddhism, Jain, and Hinduism, and continued to flourish. They even drew on the religious, mythological, and real-life aspects of the people of that time, emphasizing naturalism, and were able to express the lives of kings, the women of harem and their express position status in paintings. In later periods, influenced by various caves and empires, various styles emerged in pre-Islamic paintings that differed in size, type of painting and subject matter. But in fact, what exist in all these styles are the depiction of women and the position of women in Indian paintings as a symbol of beauty and intelligence.

1.1. Research Questions

Painting is an art that has been of interest to India in the past, and paintings on the walls of caves and temples from gods, goddesses, and kings prove this claim. On the other hand, the presence and imitation of these paintings created various styles in Indian painting. Although the themes of these paintings are mostly mystical and religious, the design, color, and type of use the colors and origins of these styles vary in India, and this has led to a variety of Indian landscapes. The main question of this research is:
  1. What was the subject of painting and how to use colors in pre-Islamic India?
  2. What factors have been considered in drawing Hindu paintings?
  3. How are women portrayed in Hindu paintings?

1.2. Objectives and Necessity of Research

The main purpose of the research is to show the history of painting in India from the beginning, the influence of different Indian styles of cave paintings and the creation of different and diverse styles in painting.

2. Research Method

The present study describes the history of painting in India in a descriptive way and analyzes different styles of painting using drawings of each style.

3. Research Background

Due to the lack of written historical sources in Persian, no special research has been done on the state of historiography in pre-Islamic India and women's painting at that time, independent of the Islamic period, and limited to some books and articles. Usually in the field of architectural art, there

are brief references to pre-Islamic painting, including the book Ancient India by Arthur Llewellyn Basham and translated by Fereydoun Badrehai and Mahmoud Masaheb, which go back to the periods of the ancient empire, the state of architecture, music, and daily Indian life. Ancient, the government and the various classes of the people have dealt. As a result of Ali Asghar hekmat's contribution to the land of India, religions, classes, sciences and arts, including painting and architecture, are briefly discussed. These works are briefly painted in India, along with architectural works of ancient India. The difference between this research and other research is that, this study deals with the beginning of painting in India and the paintings in caves and various styles of painting in pre-Islamic India and a total of seventeen styles of painting. The Indians have been studied and illustrated, described and analyzed along with their drawings.

4. Drawing and Painting in the History of India

It is difficult to say when the paintings and drawings came into being, but there are reports of ancient relics from inside caves and stone walls, and the subjects of these paintings are mostly animals such as elephants, horses, tigers And rhinoceros. Most of the paintings belong to the surviving murals in Ajanta Cave. The walls of these caves were first coated and then covered with a layer of plaster and dried, then after design, they were painted with semi-cooked mineral dyes such as ocher and azure pigments. The art of painting and sculpture was created in later periods, especially in the Mughal era of India, and these drawings are designed and drawn in such a way that it is difficult to tell if they are two or three-dimensional (Rojer, 1978 : 803). The murals discovered at Kanchi-Puram and Ellora indicate a traditional harmony between the painting and the sculptures. Thus, from the paintings in the caves of Ajanta, it can be seen that the painting is based on imaginary designs that include the perspective of society, buildings and plants of its time. An overview of Ajanta murals shows the use of warm coloring, and the natural problem is that moral scenes, only represent high human values (Khademi Nodoshan, Babamoradi, 2007: 3). Ajanta Caves is located in Aurangabad, Maharashtra, India and includes 30 caves dug into solid rocks. The cave contains beautiful sculptures and paintings that painted on the walls of the cave and beautifully depicts the art of ancient India. The paintings in this cave express the feeling that is formed in the faces of human beings and their state (Gupal, Gutam, 1990: 173). It can be said that in ancient India, painting and sculpture complemented each other in some way, their sculptures, arches, carvings and reliefs showed the depth and dimension of the painting, and then these sculptures were beautifully painted. They were created and a beautiful work was created by combining them. Ajanta Cave includes the Buddhist monks' monastery and large halls connected by a corridor, and paintings in parts of the cave depict the birth of the Buddha and stories of the Buddha's life and the statue of the gods. It is carved in the heart of the cave and painted. These painting also depict the moral and religious aspects of Buddhism (Jamkhedar, 2009: 61). Ajanta's murals, although drawn for religious purposes, evoke more of a worldly message than a religious one. On the walls of some of Ajanta's caves, paintings of kings and princes in their palaces and women of the harem, carriers, villagers and monk, along with manifestations of nature, trees, flowers and plants, birds and animals, have been permanently engraved by painters of that period (Upadhya, 1994: 9). The paintings on the walls of the Gharbagh porch, two hundred kilometers north of Ajanta, show a series of elephants, as well as a scene of a dancer and a woman. Works in the style of Ajanta's paintings and drawings can be seen in the deccan caves, especially in the Badami caves and the caves of Ellora. In the south of this area and in the Tamil region, a cave has been found in a place called Sitanavasal delicate paintings (Llewellyn Basham, 2015: 557). Similar to some of these paintings remain in Ceylon. In the middle of the island, is a large rock called Sigiriya, or Lion

Mountain, which risen 180 meters from the surrounding plain with a steep slope. Almost all of the paintings have been destroyed by the scorching sun and monsoon rains, but in some of these paintings, it is the women of charming who play with the flowers slowly and are so good and fresh. There is no one who can believe that they were painted 1500 years ago (ibid, 558). Ellora Caves, like Ajanta Caves, are full of paintings from Buddhism, Jain and Hinduism dating back to the 600-1000th century. These caves include 34 interconnected caves, and the last cave is larger than the other caves and its drawings are more advanced than the original caves. These caves are not just simple caves, but magnificent buildings carved into basalt rocks. There are 12 Buddhist caves in the south of this complex of caves, 17 Hindu caves in the center of the caves and 5 caves belonging to the Jain religion, built between the years 600-1000 AD. Kailasha Temple is dedicated to Shiva in the form of a chariot attached to the cave, and there are countless statues and paintings of gods, goddesses, and myths in this temple (Owen, 2012: 2). Most of the remnants of Hindu medieval paintings in Vijayangar, Polonnaruwa in Ceylon, and elsewhere show that after the eighth century, the art of painting was technically degenerating. The lines of the designs have become sharper and the subtle highlight of the previous era has disappeared, but it is still worth considering (Llewellyn Basham, 2015: 558). What can be said above is that pre-Islamic paintings and drawings in pre-Islamic India were an integral part of Indian architecture. Most of the surviving paintings from ancient India and the stone statues in the caves show that many of these statues were painted and three-dimensional. As we move on to the paintings of later periods, the drawings are drawn with sharper lines and finer than in the past, and drawn in more detail without prominence, so much so that they are not unlike the post-Islamic miniature paintings. These drawings are used in smaller dimensions and have great skill and elegance in their design and coloring. The purpose of these paintings is religious, mystical, and moral, but there are more cases in their daily lives. The paintings are in the order of Buddhism, Jain and Hinduism. What makes Jain's paintings somewhat distinctive is, the painting on the roofs of the caves and the presence of various sculptures that beautifully encompass a vast collection, but what most of the statues and paintings have in common is the presence of the gods. It is the goddesses and religious myths that can be seen in all the surviving works.

5. Concept of Color in Indian Painting

In Indian painting, the use of warm colors is more common than cold colors, by looking at pre-Islamic Indian painting and drawing, we see that warm colors predominate over cold one. Warm colors are dazzling and energetic. These colors are a symbol of strength and power and at the same time a stimulus, such as red, which is a strong and vivid color, or yellow, which is the color of fire and the sun. These colors inspire people's confidence, strength and happiness, and at the same time are beautiful. Yellow in the Orient is the color of the sun and a symbol of greatness and eternity. Cold colors create calm and help focus and usually show depth and distance. Cold colors are associated with nature and water, such as blue and green (Asgari, Eghbali, 2013: 47). In India, Hindus value colors in terms of symbolism, sanctity, and colors such as red, orange, yellow, blue, green, and white. For example, the color red, which is a special and favorite color of Hindus, is used as a symbol of energy in wedding ceremonies and birthdays and in Hindu celebrations. Orange is a symbol of fire and purity, as well as a symbol of religious austerity and holy people. Maybe that's why Buddhist and Hindu monks wear orange. Yellow symbolizes mind, thought, and meditation. In some of the paintings, the veils of the god Vishnu, Krishna, and Ganesh are painted yellow, indicating their knowledge of Hinduism. White symbolizes peace, tranquility, and green symbolizes nature, fertility, and success. Blue is the symbol of creation, the sky and the seas, and

after red, it is one of the most widely used colors. The colors used in Indian painting were of animal, plant and mineral origin. Among the colors of plant origin is a kind of Transparent yellow, which is known as Indian yellow, and the method was that to dry mango extract in Indian villages or to keep it semi-moist, and then It was derived from yellow and green (Jariwala, 2010: 122). Ocher clay pigments were also used to produce yellow dye (Alvand, 1363-70). Deep red is a kind of animal color used by Indian women as a decoration for coloring the fingers and toes. This color is derived from the larvae of an insect that lives on a tree of the genus Croton Ficus. This dried paint was used when needed (Gupta, 2006: 12). One of the mineral dyes used by Indian painters is yellow ocher, which is derived from a type of soil and its color is due to the presence of iron oxide in it. White was obtained from limestone, and azure blue was one of the most popular colors in Indian paintings, derived from azure (Schimmel, 2010: 271). The indigo color is obtained from the leaves of the indigo plant and has the ability to dissolve in water and be used as a substance or pigment. Blue is the most widely used color in Hinduism, and its use in the sky, ocean, and sea indicates the abundance of this color in nature. Gods such as Rama and Krishna, who spent their lives in the eyes of Hindus to protect humans and repel evil forces, are depicted with blue faces in the paintings. This color has the ability to combine with other colors and create new colors, the combination of indigo and yellow has been an ideal combination to show the foliage of trees (Jariwala, 2010: 172-173). The golden color was one of the most important colors for painters, and it was in the form of thin sheets of gold that had to be beaten and turned into paint to make it usable for painting, and some cooling oil, which is the same color combination. It was water and eggs, and it was called Tamira, and it was added to dilute it, and it helped brighten the color and turn the gold into tiny particles. Another type of golden color preparation was a combination of white alum, esparak, and a little Ronas, which were boiled to make golden color (Porter, 2010: 119). Silver was made from thin sheets of silver. This color was used in miniatures to decorate dishes, jewelry, river water, and so on. Silver-colored paints were darkened by environmental pollution and sometimes seemed metallic. The black paint used by painters was obtained from the soot of the lamp and was obtained by incomplete burning of oils or fats due to insufficient oxygen. The black color turned into a soft powder, and a few drops of gum were added to it to form a paste before adding water (Gupta, 2006: 20).

6. The Components of Ancient Indian Painting

Painting in India is a completely ancient art. The oldest colored paintings in India belong to the Ajanta Buddhist Temple Cave in Aurangabad, Maharashtra, in western India. India is a land of diversity and has created different schools of painting, music, and dance, each with its own differences, sometimes minor and sometimes general. But first we look at the features of ancient Indian paintings and then we look at Indian painting styles. These features are: 1. Rupabheda, which is known for its appearance and painting knowledge. It is meant to record only the appearance of the painting without contemplating the subject and only on the appearance and evidence of the painting. In other words, rubabheda is a kind of emphasis on all kinds of physical forms, so that it can recognize similar shapes in different situations, such the knowledge and image of a dead person from someone who is asleep. 2. Pramanam Knowledge is the measurement of lines and the correct understanding of structure in painting so that the components of the painting, along with elegance, are in harmony with each other. In other words, it provides a kind of insight and inner eye to understand the harmony and elegance in the components and basis of the painting. 3. Bhava means showing emotions and movements in painting. In other words, the painted effect conveys the feeling to the viewer and this feeling is shown in two ways, either by hiding the

hidden feelings or by revealing obvious feelings. 4. Lavanya Yojanam is the artistic understanding and inspiration of artistic elegance in painting to show the concept of painting and its apparent beauty is controlled, equal and without additional explanation. 5. Sadris Yam or the simulation industry in painting or realism or the similarity of the painter's work to the main subject of painting in terms of appearance and meaning. 6. Vami-kabhanga is in fact the painter's knowledge and correct use of paints, brushes and canvas (Sharma, 2015: 2). In ancient India, painters as a class were a society called Chitraka. In general, Indian painting is divided into two categories: murals and miniatures. Examples of murals include ancient paintings of the caves of the Ajanta and Ellora temples in Aurangabad, Maharashtra, in western India. As miniature paintings, we can mention the beautiful paintings of the Rajput period and the Mughals of India. In general, Indian painting can be divided into two categories: East Indian paintings and West Indian paintings, each has its own characteristics (Udeeps, 2019; Chakravarty, 2003: 71.73).

7. Hindu Painting Styles

7.1. Rajasthan Painting Style

Parts of western India have always been in the possession of the Rajput kings, where Rajput's special culture flourished and spread to other lands. In the Rajasthan style, there is a very subtle combination of South and North Indian painting, especially since Rajasthan was also a transit point for styles outside of India. In fact, Rajasthani painting is a small painting that follows the principles of cave paintings, but unlike cave paintings, Rajput's style is a poetic style that reflects the love stories and behavior of the gods and distinguishes between Rajasthani and cave paintings (Vaziri, 1996: 338-339). Most of the doors and walls of Rajasthan's palaces are covered with this kind of epic paintings. In fact, in these palaces, scenes from the great Indian epic, Ramayana, are depicted. This style of Rajasthan miniatures is world famous. In this style, the widespread use of gold and silver in painting was very common. In face paintings in the Rajasthani school, such as the paintings of the narrators, women are more praying, and their temples and colors are more symbolic (Craiven, 2009: 250). Rajput's Hindu schools of painting are characterized by linear designs and rich colors. In fact, this is the common denominator of all Hindu painting styles (Pakbaz, 2006: 953). What is striking in Rajasthani's paintings is the lack of boundaries between human faces and landscapes. In this style, individualism is hardly seen in physical characters, and in most paintings there are several faces. In a way, there is a balance between the background of nature and the presence of human beings in this style. On the other hand, Rajasthani's paintings were politically supported by the kings, and this was accepted in the society of that time.

Fig 1 Rajasthani drawing (https://in.pinterest.com/charulatapatil/rajasthani-paintings/)

7.2. Mural Style or Painting on the Wall

Fig 2 Mural style, Lord Ganesh (https://www.amazon.in/Pixel-Artz-Canvas-Painting-Ganesha/dp/Bo7262BEMF)
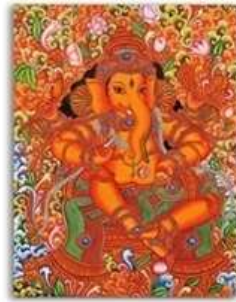
Mural paintings were drawn on the wall, ceiling and fixed surfaces. The distinguishing feature of the mural paintings is the architectural elements and the given space and the harmony of the colors in the paintings. Even some of the walls are painted with large canvases (Willsdon, 2000: 394). This style of painting has been identified in various parts of India. The paintings date back to the second century on the cave walls of the Ajanta and Hindu Buddhist temples of Elora in the city of Aurangabad in Maharashtra and in the garden caves in the Dar region in Madhya Pradesh area, the Armamali Temple Cave in Tamil Nadu, the rocky cliffs of Raven Chaya, The cave temples are found in the Sitanavasal area in Tamil Nadu, the Lipakashi area in Tamil Nadu, the Badami Temple cave in Karnataka and the Kilash Anata temples in Elora in Maharashtra (Cummin, 2006: 17). According to the above picture, in Moral's paintings the main focus is on the lives of the gods, Buddhas and Jataks (stories from local literature about the different stages of Buddha's life). This style of painting is versatile and colors and decorations can be seen on all levels. Red, orange, green and blue colors can be seen in this style of painting. One of the important elements of this style for creating a picture and its manifestation is to understand the concept of realism itself. This style of painting seems to appeal to temples, palaces and walls.

7.3. Pahari Style of Painting

Fig 3 Pahari Style (https://www.himachalstatemuseums.in/Pahari-miniature-painting-2/)

This painting style belongs to the northern states of India, including Himachal Pradesh, and is actually a kind of miniature painting of this region. The word paher in Hindi means mountain and is called the painting school of the northern subcontinent. Most of the paintings in this style are taken

from the Mughal and Rajasthani styles, and the subject matter is mostly the gods, goddesses, and ancient Hindu epics. This style of painting was formed during the centuries between the seventeenth and nineteenth centuries. From Jammu and Kashmir to Elmura and Gareval, each of these regions created a different style from the Pahari style in their region, such as the Basuli style in Jammu and Kashmir (Chakravarty, 2003: 102). In the paintings of this style, it seems that one of the main themes is the gods as Lord Shiva, Lord Krishna, Lord Rama, and the other subject of this style of painting is about love, self-sacrifice and prayer. In the steppe style of nature, it is an integral part of painting, and in almost all paintings it is seen in the background of nature and in the form of green hills, dense trees and various flowers. The main colors, especially the spectrum, green are used in this style. However, the Pahari style was a painting style that was born outside of the Mughal style and by the Hindus and kings of Rajput who had local governments.

7.4. Mysore Style

Fig 4 Mysore Style, Goddess Saraswati, (https://www.urbanpro.com/bangalore/mysore-traditional-Painting-raghavendra-b-b)

This school belongs to the city of Mysore in the state of Karnataka in the south of India. This style of painting is done on paper, cloth, wood and walls, and the subject is the gods, goddesses, religious epics of India, animals, nature and kings. Mysore School has an ancient painting and history that goes back to Ajanta's paintings. This style of painting is known for its durability and simple colors and attention to detail. The colors used in this style of painting are generally derived from natural resources, plants as leaves, minerals and even flowers. The brushes used are typically made of squirrel tail. Features of this style are fine lines, visual brush strokes, excellent and complete description and description of the subject of painting and the use of plant colors. In this style of painting, the painter's skills in expressing different emotions are also depicted. The paper used in this style of painting is sugarcane kernel, which is prepared as a paper paste and then polished with a mixture of white paint and sticky liquid similar to chewing gum to make the paper look polished. To paint on wood or wall, the wall is first covered with white or yellow ocher. Because the painting space is large, the images are usually detailed (Cummin, 2006: 34). In fact, the paintings of this style inspired by emotions such as self-sacrifice, worship, humility and inspire the viewer. Mysore's light paintings incorporate elegance, muted colors (colors that don't quickly engage the viewer, such as black in the background), and attention to detail.

7.5. Tanjore Style

Fig 5 Tanjore style, Mahalakshmi, (https://www.amazon.in/Prama-arts-Mahalakshmi-Tanjore-Painting/dp/B075PCCJL7)

This style of painting belongs to the city of Tanjore in the state of Tamil Nadu in southern India and is a kind of classical painting. This style of painting has been seen on glass, palace walls, fabrics, wood and ivory. Some of these paintings are painted with pure gold liquid to highlight the importance of painting. Tanjore style is a kind of picture frame painting or painting on a wooden board. The size of the wooden board used for painting depends on the subject of the painting. Naturally, if the subject is about kings and courtiers or historical scenes from an event or battle, the page used for painting is very large. Painted subjects are often gods, goddesses, religious sites, religious figures, and special forms. The colors used in this style of painting are generally red, a variety of shades of green, white, turquoise blue and of course the use of gold and even the use of gemstones has been seen in this style of painting. In addition to wood, this style of painting is also done on glass, mosaic and paper (Dallapiccola, 2010: 320). In these drawings, dark red, dark brown, blue and green colors are seen more than other colors in the background of the picture. The painting depicts Lord Vishnu in blue and Nataraja in white and the goddess Sivakami in green. Most of the faces in this style are designed in black and then painted, and almost all the faces drawn in the drawings have round faces with almond-shaped and elongated eyes and simple, smooth bodies. In this style, the main subject of the painting seems to be in the center of importance and larger than the rest of the painting elements.
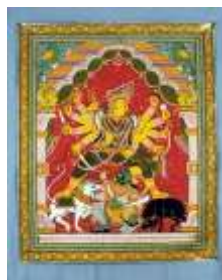
7.6. Bengal Style

Fig 6 Bengali painting,(https://www.exoticindiaart.com/m/Product/Paintings/beauty-of-anger-mahishasuramardini-goddess-durga-PL57/)

This style belongs to the state of Bengal in eastern India. The themes of this style of painting are mostly Indian mythology, the lives of ordinary people, gods and goddesses, nature and women's lives. The colors used in this style of painting are red, orange, yellow, green and blue. It originally comes from in Calcutta and Shanti Niketan and is known for its simplicity or nationalism. Bengal style is a new style in modern painting and grew in the twentieth century. The Bengal style is in fact a continuation of the old and traditional Indian style and tries to preserve these values and traditions in a new way. Abindranat Tagore, the nephew of Rabindranath Tagore, the famous Indian poet and writer, was the founder of this style (Mitter, 1994: 267; Cummin, 2006: 70-71). In this style of drawing, simple and rudimentary design and coloring are also simple and have no dimensions or shadows. On the other hand, the use of curved lines and circles can be seen in this style of Beaufort painting, which in a way evokes peace and simplicity in the mind. This style of painting depicts the social life of the people, and the paintings usually include several characters. The designs are not detailed, and the Bengal style has been at the forefront of nationalism in the face of new painting and painting techniques, and Indian traditions are evident in it.

7.7. Qalamkari Style (Engraving Style)

Fig 7 Engraving (Qalamkari) drawing, (https://www.pinterest.com/pin/366832332122516642/)

This painting style is designed with a pen on linen and then hand-painted with paint, which was common in the states of Andhra Pradesh and Telangana. This style of painting is known in Odisha and Nepal as Patchitra (Niranjan, 1973: 54). The painting is mostly about the goddess, myths and epic stories of India and the flowers, and is typically painted in the form of a scroll and inscription. It also includes epic images of Ramayana and Mahabharata. The colors used in this style of painting are also of plant, mineral and animal origin. The petals and roots of some plants, as well as minerals and milk, are used in color combinations. This style of painting was later popularized by Muslim kings in southern India as the capital of Golkonda and became popular during the Mughal period in India and influenced by Iranian engraving (Cummin, 2006: 72-73). In this style, a large amount of cloth or canvas is filled with small dots that indicate the desired design, the main design of which is the body of the goddesses, similar to Buddha paintings and literary stories related to the stages of Buddha's life. One of the prominent features of this style, according to the existing drawings, is the use of a uniform background to show the engraved drawing, and the drawings in the painting have different and non-repetitive modes.

7.8. Kalighat Style

Kalighat's painting style is derived from the name of the Kali Temple in the Ghat area of one of the branches of the Ganges River in the south of Calcutta (Gosh, 2000: 11). This style belongs to

the state of West Bengal and began to grow in the nineteenth century. The subjects of these paintings are mostly gods, goddesses, epic Indian stories and ancient legends. Painters of this style depict images of the gods Sita and Rama, Rada and Krishna, Hanuman, Parvati, Durga, Ganesh and other characters. This style of painting even paints important historical figures such as Rani Lakshmi. This very simple painting style comes with simple, rudimentary designs and is then hand-painted. Local and rural painters draw these paintings on cloth, and because they are traveling, they wrap the paintings in a scroll and take them with them (Cummin, 2006: 78-79). Among the paintings of this style, the faces of the goddesses of Durga and Parvati can be seen more than others, and according to the paintings and other drawings of this style, it can be said that in the background of this style, bright colors and Yellow is finally used, cream, gray and blue.

Fig 8 Kalighat Style, Goddess Durga, (https://sarmaya.in/spotlight/souvenir-art-the-divine-comedy-of-calcuttas-kalighat-Paintings/)

7.9. Warli Style

Fig 9 Warli's drawing (https://en.m.wikipedia.org/wiki/Jivya-Soma-Mashe)

Warli painting includes a kind of folkloric painting of the tribes of Maharashtra to Gujarat (western India). The oldest type of Bim Batik is the most popular folk painting in Madiparad, and it includes a type of painting of rocks, mountains and house walls that shows the daily life of the people. The painting is usually painted with thin bamboo sticks on the surface of thatched walls. To perpetuate the effect, a mixture of rice juice and water, which is sticky, is added to the paint. This style of painting has also been seen on fabrics and pottery. In this painting, geometric shapes of circles, triangles and squares are used alternately. These shapes symbolize the manifestations and elements of nature. The role of the circle is a symbol of the nature of the moon and the sun, and the triangle represents mountains and trees. Man himself is portrayed as a creature of nature in the form

of a triangle, but his achievements are shown in the form of a square. The focus of this style is typically on female gods who are a symbol of fertility and blessing. All in all, drawing the gods of men is not common. But nature and man and animal are symbolized by different triangles and are seen in different types. The tip triangle is called Torso and the triangle tip is called Pelvis, and it is a symbol of balance in the natural world. In this painting, the larger triangles represent men and the smaller triangles represent women. Portions of the painting also depict ordinary, everyday life (Tribuwan, Fikenauer, 2003: 22-23). What stands out in this style is the basic technique of humans depicted in the middle circle of a painting, drawn in the shape of a snake. In Warli's painting, the background is dark and usually dark red, brown, and dark blue to indicate the shape of the painting. In the Warlie,s style, the subject is painted in geometric shapes with smooth, curved lines, and the painting lacks fine dimensions and components. Warli's paintings sometimes have a painting theme and are sometimes a combination of several small paintings centered on a circle of humans.

7.10. Phad Style

Fig 10 Phad Style, Textile Gallery, (https:www.hisour.com/textile-gallery-museum-of-king-shivaji-india-34913/)

This style of painting belongs to Rajasthan and is a kind of religious and folklore painting whose topics are mostly about Hinduism and mythology. In fact, the pad is a long scroll of fabric or paper (Kumar, 2007: 83). This painting style shows itself with images of Pabuji, one of the strong and local gods of the Rajasthan region. Templars, clerics, singers, and local storytellers in the Rajasthan region installed the scroll in the temple and told its stories to the public. The stories told in the paintings are generally dedicated to the stories of Ram Charit Manaz, Gita Guinda, and Hanuman Chalisa (Cummin, 2006: 95). In pad style, paintings usually have golden borders like frames. The background of paintings is usually the main colors, especially red and green. In this painting, humans and drawn characters have different and non-repetitive figures. The colors red, chalk white, and gold are abundant in this style of painting, and the blue color is quite clear to show Lord Krishna in this style.

7.11. Patua Style

Fig 11 Patua Style (https://www.itokri.com/collections/2017-315-1-Patua-Painting-by-laltu-chitrakar)

This style belongs to Western Bengal, Bihar, Jarkhand and Odyssey, which is a kind of painted religious scroll and the patua's are the painters of this region. In fact, these painters narrate religious issues and events with their visual art and those who hire these painters are basically calling for the spread of Hinduism. In the past, the narrator carried the painted scrolls from village to the other village and recounted his paintings and stories with singing and drums. It is believed that most of these narrations or patuas later became Muslim. The subject of the paintings is religious, historical and literary stories. In addition to patuas, painters of these scrolls are also called chitrakar. Their purpose is to tell religious stories and they are from all religions of India, including Hinduism, Buddhism, and Islam (Siddiqui, 2004: 279). The design of this simple and colorful style, using the original colors, has no shadows or dimensions. Apart from the ornaments of the gods, which are described in detail in the paintings, there are no other details in the character of the paintings. In the pad style, the focus of the painting is on conceptualization the paintings of Radha Krishna gods.

7.12. Tharu Style

Fig 12 Tharu's Style (http://www.asianart.com/tharu/)

A type of folklore painting belonging to the inhabitants of the Indian-Nepalese border in an area called Tarai, and most of its inhabitants in Nepal and India and the northern states of Himachal Pradesh and Uttar Pradesh and Bihar. The painting style is actually colored paintings on the walls and doors and columns of the exterior of the house, and its subjects are everyday stories and people's lifestyles. Their drawings are colorful, simple in design and color, and the materials used to make the paint are generally of plant origin. Oysters, bird feathers, and delicate wood are also used to decorate paintings (Cummin, 2006: 105). Another use of this style of painting is in the form of tattoos on the hands, chin and cheeks, due to customs and beauty, and usually in the form of small dots or short lines, basic and simple designs of humans, animals, birds, Plants and flowers (Maiti, 2004: 231). In this style of painting, humans, houses, elements of nature and animals can be seen in abundance. The most important painting theme in this genre is mythological paintings. One of these mythical paintings is the role of the peacock, which is larger in paintings than other birds. Ramasita's paintings contain interest, feelings, happiness and blessings for the family. Lord Krishna is one of the most popular Hindu gods in this style.

7.13. Pattachitra (Patta Chitra) Style

Fig 13 Pattachitra Style (https://www.eventshigh.com/detail/delhi-Pattachitra-workshop-at-sanskriti)

This painting style belongs to the city of Puri in the state of Orissa in eastern India and is a kind of folk painting on fabric. In Sanskrit, petta means Karbasi cloth and chitra means image. The paintings of this style are about the gods and goddesses of Hinduism and Hindu mythology. The painting is in the form of a scroll, and the narrator narrates the stories to the people through the paintings. Pattachitra is an ancient work of art by Odisha (Orissa) and the stories are performed in the form of poetry and song. Pattachitra's paintings come in a variety of forms, including mythology, religious tales, local tales, and everyday tales. The narrator of Pattachitra's painted stories is called Patua (Roy, 1973: 54-55). The colors used in this style are plant, mineral, rich, red, yellow, and blue. Theses colors are usually used more than other colors in painting. The designs are simple and have no shadows or dimensions, but the decoration of clothes and jewelry is observed in detail, especially in religious stories in this style of painting. The paintings are usually painted on fabric, walls and palm leaves. Lord Krishna, Rada and Jataka (various stages of Buddha life) are the main themes of this style of painting.

7.14. Saura Style

Fig 14 Saura Painting (https://www.tribesindia.com/product/saura-black-tassar-silk-Painting-12/)

A type of folk painting style belonging to Saura tribes such as Ragurajpur, Raygada, Gajapati and Kurapout in the state of Orissa in eastern India and is also called by other names such as Sabara and Sur. This style includes painting on the walls and houses, known as statues or images and is based on elements of nature such as the sun, moon, trees, and animals such as horses and elephants. This painting is very similar to Warli's painting and the painting theme is illustrated on the basis of sacred spiritual and religious aspects (Bibhudutta, Divyadarshan, Sharma, 2020: 2). In paintings, red and yellow colors are usually used, especially their combination to show the earth. Paintings are considered during ceremonies such as childbirth, harvest, marriage, and religious ceremonies. These paintings cannot be repetitive or remain in one place forever (Cummin, 2006: 107). In fact, Saura and Warli's painting style are somewhat similar to tribal paintings, but unlike Warli's painting, Saura's human face is not very clear. In other words, there is no physical difference between the drawing of men and women in the art of painting.

7.15. Kangra Style

This school of painting belongs to the state of HimachalPradesh in northern India and the subject of this style of painting is about the daily and normal life of the people in the eighteenth and nineteenth centuries. This painting grew in the post-Mughal era of India. Most of the school's

paintings are about Indian love stories about God and the famous Hindu goddess Radha Krishna and Gitagoinda (Chaitanya, 1987: 62). The main centers of Kangra style painting are the Galer, Bassoli, Chamba, Norpur, and Bilaspur paintings in Himachal Pradesh. Kangra painters use different shades in paintings, for example, they use light pink on top of hills to indicate the distance in some of the paintings. The figures and mannerisms of women sit (in the form of two or four knees) are polite and dignified in beautiful paintings. Painted images usually include pictures of women with beautiful landscapes. Minerals and plants, and generally cold dyes, are also used in the painting (Cummin, 2006: 115). It can be said that the appearance of Kangra is the greenery of the landscapes and the background of the painting. The leaves of the trees are relatively large and varied in painting. What stands out in this style is the use of several types of shadows that give the painting some depth and sometimes distance. Flowering plants, ivy and small streams can be seen in this style of painting.

Fig 15 Kangra Style (https://hpkangra.nic.in/gallery/kangra-Paintings/)

7.16. Shekhawati Style

Fig 16 Shikawati Style (https://travel.paintedstork.com/blog/2008/12/rajestan-havelis-of-shekawati.html)

A painting from the state of Rajasthan that became popular in the seventeenth century. The painting is a kind of mural that covers the walls of palaces, aristocratic houses and temples, and the subjects of this style of painting are images of kings and queens of the region, epic stories of India, historical events, nature and romantic scenes. This style of painting was created by the builders and architects of the walls. The materials used in this style of painting are also minerals and plants. Red, white, purple, blue and azure color are used in the paintings. First, the work surface is prepared with gum or a sticky material and then the drawing is done, then the painting is polished with coconut oil. It is natural that these types of paintings are mostly painted by hand and sometimes they start by creating dot. It means they shape the painting with dots, which is very interesting and artistic (Chakravarty, 2003: 112). . In addition to depicting the size of humans in the background, these paintings are also larger in size than the paintings in other styles. In this style of painting, gods such as Lord Shiva, lord Ganesh, the goddess Durga and Saraswati are depicted more than other Hindu gods. This style is used to decorate and beautify the walls of palaces, temples, around entrance doors and arches.

7.17. Basoli Style

Fig 17 Basoli Style (https://visus2016.wordpress.com/national-museum-2/)

The paintings of this school belong to the Himachal Pradesh verses in northern India and are a kind of miniature painting whose subject matter is the gods and goddesses and epic stories of India and the image of the kings of the region. This style of painting is common in Jammu and Kashmir and on the right bank of the Ravi River. This style of painting is remarkable for its magnificent palaces and miniatures, created by Raja Bupat Pal in 1635. In this painting, original colors have been used. The design of the face in these paintings is very delicate due to its miniature, and gold color has been used to decorate it. With a masterful background, the image of human beings is magnified and noticed. The way people are placed and how they stand is shown in these magnificent and beautiful images (Chaitanya, 1987: 62-63). In this style, the background image does not matter the main theme of the image and somehow skillfully draws the viewer's attention to the characters in the image. In fact, the goal is only human beings and their status.

8. Women in Paintings

In pre-Islamic times, women's paintings were depicted as primitive paintings on the walls of caves and temples. Although these images are drawn for religious purposes, they convey most of the worldly messages to the viewer. Among the images and paintings of Ajanta Cave, in addition to the image of male gods with a jewel crown in the right hand of these gods, the white lotus flower can also be seen. Also around these gods are beautiful heavenly maidens, all of whom are smaller than the original image. The paintings on the walls of the garden porch, about two hundred kilometers north of Ajanta, show a row of elephants, and paintings of humble and dancing women can be seen on the walls. In the paintings left in the floodplain in the middle of the island, there is a large rock called Sigiriyah or the Lion Mountain, in which images of gods and demigods and celestial beings are painted on the cave walls. At the top of the cliff, you can see pictures of Charming women painting flowers, and they are so well preserved that no one can believe they were painted 1,500 years ago (Llewellyn Basham, 2015: 557).The most important feature of pre-Islamic painting style was the naturalistic view of Indian artists, but due to the fact that Hindu rulers and leaders in India did not consider painting to be a godsend, it was neglected (Ahmed, 1988: 192). In the Ellora area near Hyderabad, there are caves with pictures, images and sculptures of Vishnu on the walls. Vishnu is one of the three hindu gods who is the god of death and creator of beings. The miniature industry was used by Buddhists and Indian jains to decorate religious books. In Gujarat, Bihar, and Rajputana, this art perfected, and little by little, paper replaced the stems and leaves of dates. From the fourteenth century onwards, works of this style were invented in religious books, and from this time on, these paintings and drawings acquired technical subtleties. Until the Mughal kings came to India and the art of face painting, simulation and miniature flourished during

their time (Hekmat, 2012: 333-334). The surviving paintings show that painting in ancient India had good artistic features. The palaces of kings and the houses of the rich were decorated with beautiful murals, and smaller paintings were painted on polished boards and cardboard. Not only did professional artists paint, but many men and women could also paint well because of the interest and training they received. The subject of painting and miniature painting before the Mughals of India depended on religious subjects or the literature of that period. Romantic concepts and depictions of them were derived from the lives of gods and goddesses, such as gods such as Rada-krishna or Gita-govinda. The images and drawings of this period, both male and female, were highlighted and distinguished by their outward features. Big eyes, stretched noses, and women are depicted with straight, long and black hair. Also, the jewelry used by women and what is used as decoration on the hands, feet, hair, nose, back, ankles and neck can express the social class of the woman and her status (Kossak, 2005: 977; Mattur , 1982: 24).

In view of the above, it can be said that the type of clothing worn by men and women also indicates their class, occupation and position, which are skillfully portrayed. In the paintings of this period, the background is somehow intertwined with the main subject of the painting. Trees, rivers, flowers, birds, houses, and household items such as chairs, lights, curtains, and decorative pillows are some of the things that have received a lot of attention in these paintings. In Rajput's Indian style of painting, which is more original, features such as depicting clouds, rain, snow, and hills of the lower structure of which is in the form of tall cones with smaller components such as flowers and Covered shrubs are used. In this style, the method of differentiation between night and day, which is achieved only by changing the background of the work and without changing other decorations, also has a special appearance. The use of color in this style has a special feature and in terms of color transparency, it is comparable to the colors used in enameling on dishes. Although the images are engraved in blind and dull backgrounds, the range of red, yellow, pink, green, brown, and blue colors, along with chalk white and black glow, has given a special effect to this style (Kumarswami, 2003:172). The colors used in the paintings of this period were mostly used to decorate and beautify the paintings. In the pre-Mughal period of India, the art of painting was encouraged by kings, courtiers, the rich, wealthy merchants, and religious leaders and painters were usually among the people of the community and the middle classes (Hekmat, 2012: 41).

It seems to be rich in golden color in court paintings to show the power and greatness and importance of kings and court women in covering hats, crowns, half crowns, long and thin halves of court women, princesses' shawls, The fringe of women's thin shawls, the fringes of women's skirts, and the jewelry used for men and women have been used. One of the features of this style of painting is that of kings and court women in the open air of nature, which goes back to the ideas of Indian naturalism, which has deep roots in the culture and art of this land. The presence of the elements of nature in the background of paintings such as the blue sky, the leafy and flowering trees and even full of fruit and the presence of symbolic animals of India such as peacocks, parrots and elephants indicate that in Rajput's paintings also the backgrounds. They are as important as the faces depicted, and even the details of the backgrounds are depicted in the paintings. In Rajput's style of painting, henna is seen on the palms and soles of the hands and feet, which is usually shown in delicate, beautiful patterns and in red. In Rajput style painting, the hair is usually seen from behind the silk scarf, straight long hair with long silk ribbons woven from golden strands or fresh flowers. The eyes are kohl (eyeliner) and the corner line of the eye, which is also typically made of kohl, extends outwards and upwards. In group drawings, women are usually seen performing religious ceremonies (Schimmel, 2010:197-199).

9. Conclusion

By observing the Indian paintings, it can be concluded that the subject of the paintings deals with religious, mystical and moral aspects. In the drawings, the gods, goddesses, kings, princes, queens and other women of the palace, the villagers, the Hindu and Buddhist monk, the manifestations of nature, flowers and plants, birds and animals are involved. Also, the concepts of love and depicting them are taken from the lives of gods and goddesses such as Rada-krishna and Gita-govinda. In the pictures and drawings of this period, male and female illustrations are highlighted by their appearance features such as large eyes, nose, and in women, straight, long and black hair, as well as the use of colorful jewelry and coverings. In pre-Islamic Indian paintings, the background is less important than the main subject of the painting, only in Rajput's painting the background is somewhat important and in most of the paintings, especially the painting styles close to The Mughal period, elements of nature such as the blue sky, deciduous trees, rivers, flowers, birds and animals are seen as symbols of the Indian land such as peacocks, parrots and elephants. The further we go from caves to later periods, the designs are elegant, smaller, and skillful and there is more variety in the coloring. The colors red, yellow, green, and blue, as well as the combination of colors, along with the use of white and black, it has given a special effect to the paintings. The golden color has also been used in court painting to show the power, greatness and importance of kings and court women, as well as in depicting gods and goddesses for their holiness and greatness. In Indian painting, the use of colors of plant, mineral and animal origin, more application of warm and original colors, portrait painting in nature, painting several faces in the painting along with class differences and pictures drawn from the daily events can be seen at the court. The paintings on the walls of the caves also give the viewer the same feeling in a simpler way. This shows that women have been in painting since the beginning of painting and sculpture in caves. In pre-Islamic Indian painting, women were first sculpted and painted in the form of statues of various goddesses, and they were intelligent and beautiful, and in Hindu painting styles in the post-cave period, even women as portrait or the group of woman, they also see the gods and goddesses in worship.

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Geographical Indicator Product of Bangladesh, Jamdani: Possibilities of Community Development for the Weavers of Traditional Cottage Handloom Industry

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Abstract

In Bangladesh, where pre-industrial traditions are still active 'folk arts or crafts', but artisans belong to socially and economically marginalized households, as in the lower caste system. Traditionally, they contribute their knowledge of local materials. Their visual and tactile connections to cultural identities and integrity among communities had been profound. Jamdani have been successful in acquiring a Geographical Indicator (GI) Certification but facing threat from the spurious garments production of nearby Narayanganj, the backbone of the country's economy; RMG. Though, there is a large demand of Jamdani clothes and fabrics for their distinct style only in the fashion houses and boutique shops, they are falling behind for their low rate of production, low wedge earning and lack of skilled workers.

Method: The methodology of study will follow an extensive sociological field survey and by explaining proper number of cases, their need and opportunities found in reality and compare it with the facts inscribed in literature review of previous scholars.

Possible findings: This study will focus and derive some propositions for community development and suggest some solutions: introduce automatic or semi-automatic loom, provide training to the weavers and ease the institutional marketing policy. Therefore, an incorporated Jamdani handloom development to implement handloom marketing-documentation is needed to engage with local communities for developing creative solutions and sustainability in local economies. Tangible and intangible resources must be addressed holistically, treated with due respect and carefully unveiled as cultural assets to prevent its extinction.

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1. Introduction

The word Jama (e) in Persian means 'clothes' and Jamedan means 'closet' or 'wardrobe,' while Jamdani in Bengali directly refers to sharee. Some scholars think that the word also means 'wine cups' which are very delicate and is comparable to the delicate texture of Muslin. Jamdani is a beautiful revelation of artistic talents of Bangladesh. The Jamdani weavers are cloth producers by inherent because what they are designing the configurations today, once those were created over in muslins by handloom (Ghosh and Akter, 2005: 1-12). The design evidence of Jamdani and Muslin could be referred as cousins. In Persian language means a closet or wardrobe. In the textile history of Bangladesh Jamdani generally refers to the shari, the most popular clothing of Bengali women. Here are the three authoritative definitions of Jamdani from scholars;

1. A kind of cloth in which the flowers are woven and not worked generally Muslin (Hunter, 1808: 539).

2. A Dacca Muslin woven with figures of flowers and other ornaments, (Knight, 1881: 120).

3. A type of brocaded Dacca Muslin, usually flowered decoration (Cannon et al. 2001: 150).

Beyond the definition of Jamdani that highlights flower, there are other intricate issues   for understanding its specialty. The patterns are generally geometric and designs can contain items other than flowers, such as plants and living species like fish (Gillow and Barnard, 2008: 186). The range and varieties of Jamdani are quite extensive and numerous, but there seems to be three basic layouts: Jaal, the most intricate, is an all-over design covering the entire ground; Terchi, denotes floral or geometric diagonal; and Buti is a combination of individual floral motifs and springs scattered across the fabric (Ghuznavi, 2006: 47). "*The Jamdani or loom-figured muslins, from the exquisite delicacy of manipulation which many of them display, may be considered the chef-d'oeuvre of the Indian weaver. Their complicated designs have always constituted the most expensive productions of the Dacca loom*" (Watson, 1866: 79). It seems that in terms of design, Jamdani was not a static weaving practice. Over times the floral designs gave way to a diverse pool of designs, focusing on local flowers and plants, signifying local orientation (Ghuznavi, 2006: 48) (Figure 1). Designs are drawn from the natural environment of Dhaka in particular.

Fig 1 Typical floral Jamdani pattern (Source: Author)

Following is a list that reflects this enormous diversity of designs used by the Jamdani weavers (Sayeedur, 1993). The patterns are inspired from folk motifs and shown below: (Table. 1) (Jahan,

2013: 33-38). (Figures 2, 3)

Table 1 Surviving patterns of Jamdani (Jahan, 2013: 35)

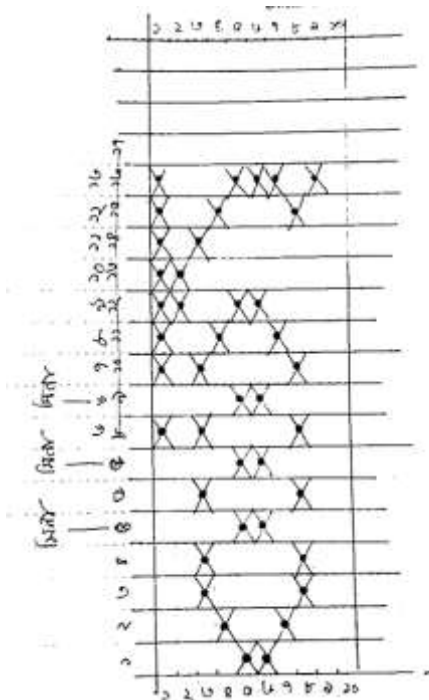| Pattern (Bangla Name)	Meaning in English
Angti	Ring
Angur	Grapes
Baghnoli	Tiger claws or paws
Beli	Jasmine
Dalim	Pomegranate
Dubla	Tender grass
Ganda	Marigold
Golap	Rose
Kalmilata	creeper
Kakra	Crab
Kochu	Arum
Kola	Banana
Korola	Bitter goard
Moyur	Peacock
Motordana	Peas
Paan pata	Betel leaf
Pona	Small fish
Sabudana	Barley
Shankha	Conch Shell
Shap	Snake

Fig 2 Plot for weaving a Jamdani pattern, on 10X,13Y grid (Source: Omar Faruque)
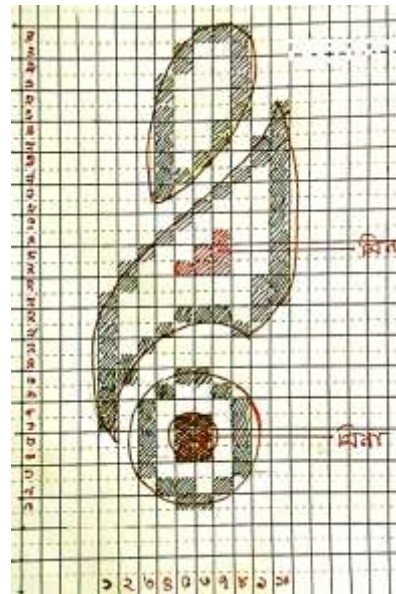

Fig 3 Plot for weaving a Jamdani pattern, on 10X,16Y or 32 numbers of ½ Y grid (Source: Omar Faruque)

Nearly 40 equipment are used for making a Jamdani piece, some notable equipment are: Taant (Loom), dokti (sley), Maal dori (rope), Maku (shuttle), Chakku (scissor), Noksha (Design Bobbin),

Chata (Bamboo Stick), Tolpao (paddle), Biter Bhaar (Weight), Shana (yarn holder), Muni (yarn tighter), Nachni dori (dancing rope), Narod (beam and yarn holder) (CPD, 2014). The Jamdani making process comprises a few layers of different professional expertise. Some of these are involved with preparatory phase and some with weavers; the division of labor is done in 7 steps: (Table 2) (Figures 4-12).

Table 2 Steps of Jamdani

Step 1	Coloring of Yarns
Step 2	Pari, The yarns are mixed with the rice starch (sizing process), and set in the wheel
Step 3	Tana Hata (Warping)
Step 4	Shana Gatha (Denting)
Step 5	Tanani (Beaming)
Step 6	Ba Gathani (Drafting)
Step 7	Paya Fela (To set up the loom for preparing Jamdani)

Fig 4 Chakku, equipment for weaving

Fig 5 Spinning wheel

Fig 6 Chata (Bamboo stick) in Jamdani handloom

Fig 7 Paya fela, the feet technique of handloom

Fig 9 Tana Hata (Warping)

Fig 8 Muni, yarn tighter in the loom

Fig 10 Dyeing and coloring of cotton

Fig 11 Tanani (Beaming)

Fig 12 Ba Gathani (Drafting)

In contemporary lifestyle we find them in the form of saris with a great variety of patterns donned with geometrical motifs designed on simple frame or pit looms. During the weaving process a paper pattern is kept beneath which acts as a trace to set up the design onto the sari. Generally two weavers weave together for a single Jamdani sari (Craft Artisans, 2017).

2. Background

Bengal had an old reputation for cotton textile production the center being at Dacca. Later, it also reached a place of prominence through their dexterity in the weaving of finer cotton textile. In his book 'Arthasastra' Kautilya mentioned that Bengal was very famous for weaving industry. During 73 BC Pliney also praised highly about the silky elegance and finesse of the muslin clothes (Mallick, 1986: 361). He wrote: "The muslins of Dacca were known to the Greeks under the name of Gangetika. Thus it may be safely concluded that in India subcontinent arts of cotton spinning and cotton weaving were in a high state of proficiency two thousand years ago while cotton weaving was only about to get introduced in England during the seventeenth century" (Laha, 1925: 98). In 1496 AD Poet Bipradas from Orissa state, in today's India had praised highly in his composition 'Mansamangal', that then cotton textile woven in Bengal. He mentioned the name of Saptagram. In Sixteenth Century several European traders used to visit Saptagram with loads of items in their ships and exchanged them for cotton clothes and several other products from Bengal (Figure 13) (Basumati, 1925: 836). Therefore in the Bengal civilization during the ancient and Middle Ages, weaving industry had influenced so much that its eminence over other trade practices was unquestionable. It also got a place in Victorian Albert Museum of London and Guimet Museum in Paris. Jamdani was produced in two out of eight Aarongs of the then Dhaka (Dr. Hameeda, 2018).

Fig 13 Carpus cotton 1828, Calcutta (Source: www.drikgalleryblog.com)

3. Ethnical Group

The passage of time has brought about a change in the weaves, patterns and designs but the importance of handloom community still remains the same. There was hardly a village where weavers do not exist weaving out the traditional beauty of the region in the past. The skills and

activities are kept alive through generation after generation. They are the class named 'Basak'. They are basically from labor caste known as Kayastha. This is a non-uniform functional group of Hindus, considered to be members of the scribe caste, and have traditionally acted as craft trade (Arnold et al. 2011: 403–404). Bengal weavers were divided into different classes like Ashwina or original weaver, who are again divided into five classes Bardhamani, Barnakul, Modhyokul, Madaran, Uttorkul. Banga all of them lived in East Bengal, todays Bangladesh. It is well known by Basak weavers that belongs to the Balarami caste are the best. 20 miles north to Dacca city is Dhamradhu where there was a settlement of about 250 Banga weavers. The weavers at Dacca are divided into two sectors; Boro Bhagia or Jhapania and Choto Bhagia or Kayet weaver. Another group was found in Dacca named Mogi (Sodhganga, 2017). Blended with myths, faiths, symbols and artistic imagination, the cloth created appealed dynamism to its fabric. The Jamdani reflect the rustic culture of crafting villages while the embroidery pattern exhibits the creativity of those ancient artisans. Through the fulcrum of beliefs, skills and aspirations tends to stream creation, production, transaction and fulfillment, they are still bearing a legacy.

4. Problem Statement and Research Rationale

This study is going to be organized as inter-disciplinary approach to addressing the issues of livelihood, regional cohesion, social welfare, local economy, sustainable management and traditional craft skills, and to design creative ways to generate economic opportunities. The relevant outcomes and appropriate approaches developed out of this research could even serve to develop internationally applicable models, policies and approaches to sustainable management of heritage based community. In order to succeed, three critical elements that underwrite proper functioning of any traditional craft need to be adapted: Artistic, Scientific and Economic sustainability. Heritage-linked creative economies are self-sustaining because it's strategic asset for national culture. It also strengthens local distinctiveness, supports employment for local generations and contributes to national GDP.

4.1. Craft Value

The creative class, weaver is a very capacious grouping of many different kinds of professional, managerial and traditional workers. If nourished, it can substitute income generation, create job opportunity and export wages while promoting social inclusion, cultural multiplicity and human development. Culturally, the artisan sector has in the past seen its peak of sophistication, as for instance the Dhakai Muslin, was acquired through generations of masterly craft practices and became hallmarks of the world class quality. Jamdani could be an opportunity for Bangladesh to gain that pride again.

4.2. Economic Value

Despite all odds, and compared to 1,600 Jamdani weaver families in the year 2000, the number increased around 15,000 including 3,000 families in 2013 with 15,500 weaving units and it is estimated that about 2,000 pieces of Jamdani saris are being produced per week. The price of saris ranges between Tk. 5,000-40,000 while specially made saris may cost maximum Tk. 150,000. In the fiscal year 2010-11, Bangladesh's leading Jamdani export market was India which was worth of USD 6.12 million against USD 1.49 million of fiscal year 2008-09 (Suman, 2013). The total export of Jamdani saris to subcontinent, Europe, Middle East and North America jumped from USD 4.84 million in 2008-09 to USD 10.41 million in 2010-11. The total spot order in Dhaka trade fair in

2011 alone was worth of Tk. 120 million (Financial express, 2012). Today, about 40 percent of the internal demand for textiles is supplied by the various handloom productions including Jamdani industry. (Ahmad, 2012) Since almost 100% of various types of hand loom units including Jamdani are situated in Demra, Narayanganj, Narshingdi, Shahzadpur, Pabna and Tangail (Chaiti et al. 2013: 3) and the competition in these industries are comparatively low and it contributes more than 10 billion taka (Ojonika, 2017) annually to the national exchequer as value addition. These six places cater to the needs of the entire country and also West Bengal of India. That is, compared to the demand for the products, the numbers of suppliers are very few and almost all of them get a good trade during the festivals. But there is some competition among these six places as customers perceive quality of products on the basis of region. For example, products from Shahzadpur or Tangail, Demra, Narayanganj are perceived to be superior to the products than other places (Figure 14).

Fig 14 Expensive Jamdani Sari in shopping mall, Dhaka (source: Dhaka international trade fair 2011)

5. Research Question

As for the societal aspect, the industry is not harming the natural environment as it is a manual industry with less use of chemical lubricants. On the other hand, Garments Entrepreneurs are careless about the waste disposal system which ultimately contaminating environment, which is the vital part of this research's rationale. The development of Hand loom industry has made a big impact on the rural societies from remote past and how it is still sustaining only in this region, not anywhere else is a subject to be investigated. Places like Demra and Modonpur were historically commercial nucleuses of such trade. For example, in Demra, many adjacent businesses have already developed by highlighting the Jamdani Hand loom industry. Unemployment could be reduced to a great extent which was previously a great social problem and also now sustaining in this region. This curse gave birth to a number of anti-social circumstances like hijack, loot, robbery, rape etc. in this area and generated evil impression on the society in last two decades. If most people can easily get jobs and earn money with dignity, the popularity of craft based vocational education and literacy rate might bloom in this weaver community. Proper government regulations are still absent for weaver community and revival of Jamdani tradition. Comparison between today's garments sector will clarify how decisions would be made for future survival.

5.1. Objectives

Based on the analysis of traditional crafting practice with their historical values this study is an evaluation of weaving tradition and community context of Bangladesh and the study has five main objectives to ascertain these:

1. The primary focus of the study is to define the effects of craft based livelihood on rural lifestyle as well as the creative inheritance and the environmental quality which responsible for weaving only in this area by utilizing landscape resources according to local plantation and climatic factors.

2. To ascertain the causes of existing ineffective and struggling practice of traditional values and how they deteriorating surrounding environment by creating hinders day by day.

3. To investigate the possible options to introduce modern technics to preserve the geographical indicator product of Bangladesh.

4. To provide some recommendations for concerned authorities to ensure better integration for Jamdani weaver community, and supporting handloom practice for sustainability and enhancing intangible values.

5. To make the people conscious about Jamdani as thousand years' pastoral practice along with modern day demands and enhance acceptability to local and international users with proper advertising.

5.2. Scope

This study is emphasized on the synthesis of symbolic patterns, aesthetics and weavers' crafting practice from different parts of Bangladesh regardless of any timeline. Common issues of trade based community; social and cultural aspects which shaped the common plot of traditional practice and heritage were highlighted. Besides, how regional microclimate influenced the practice of weaving, indigenous materials and how weaving technology was implemented- were also discussed. Economic effect of production and trading pattern has also been analyzed. The research scope was based on three broad approaches:

1. To establish a Theoretical framework for analysis (based on literature review)

2. Deriving results from Empirical basis (based on analysis of the study)

3. Extensive survey is done based on this study which can eventually guide to generate some sustainable principles to modernize the weaving practices without doing any harm to Jamdani's original aesthetics and usage.

5.3. Limitations

1. The trending trades and income level in any particular economic aspects was identified under broad category, detailing of individual status was ignored in the study due to limitation of time.

2. Only the selected important segment of weaving village was taken into consideration, other potential areas were excluded from the study.

3. Only the simple tools and portable equipment for quantitative survey analysis was introduced. More contemporary survey tools will give exact situation for the explanation.

4. Different time of the different seasons might give us more précised overview. For example, this survey was only conducted in winter time, could be prioritized if conducted in the festival times like Bangla New Year, Durga puja and two Eid holidays.

6. Methodology

To document the geographical indicator features of the weaving of Jamdani at Demra, this research was conducted between September-December 2017. Data was collected through focused group discussions, one-to-one interviews and informal discussions with photographs that portray the whole production process and techniques: from pre-production preparation, designing to marketing, etc. At the same time, a general perception on the socioeconomic condition of weaving industry was assembled from the study through profound surveillance. The study methodology consists of the following four steps:

Step 1: Selection of the study and survey area**.**	The study focuses and appreciates the Jamdani craft practice founded in Demra, one of the closest districts of capital city Dhaka which tends to stretch toward its direction. The selected distinct part of village Demra is still known as the core rural area while the surroundings are on an advance phase of that rapid urbanization. Survey sites were Demra and Noapara Jamdani wholesale market where concentration over a field survey carried out for documentation of production and existing structures. Physical features of built form and the determinants which shaped the form-space as influential factors were also assessed to know their possible threats.
Step 2: Data Collection In this research, user involvement tool is incorporated with data collection as participating users at a prearranged context should be the main source of information. (Groat, 2001). The process includes two steps.	**a) User perception investigation:** Total 7 industries were surveyed during this research period. Users were interviewed with some simple questionnaire and equipment. The survey included questions dealing with family history, occupational information, legal issues of ownership, business pattern, climatic adverseness, and sociological aspects and other issues related with craft based community. The collected data from oral survey were accumulated to have a brief understanding of the prevailing context why this specific Jamdani style emerged and still contextual.
	b) Literature study For the lack of scholarly apparatuses, literature survey did played an effective role in this research. Some legal documents were collected to know the weaving data and information provided by scholars of previous studies were followed for recording the analysis.
Step 3: Analysis	All the available data from the survey were meticulously analyzed to make this study, which documented and revealed this particular heritage from a view point of the intangible value.
Step 4: Deriving results, identifying challenges, suggestions and recommendations	Will construct the concluding remarks of the study

7. Literature Review

7.1. History of Jamdani Craft

Jamdani weavers have a genuine sagacity, superior knowledge of fabric which has driven them since centuries to intertwine and that's why this tradition is still in practice today. Historically, an entire social class was entirely dedicated for this and the level of artistry and intricacy achieved by Bengal's ancient Muslin and Jamdani fabrics are unparalleled and unique. Such cultural heritage found only in this region of the world, bestowed with such natural blessings. It's a craft of the finest possible weaving in human history and it possesses a huge part of our indigenous culture. These weavers' skills evolved over thousands of years and Jamdani was such valuable fabric of consumption that attracted international trade via maritime Silk Road in the past. The parameters and related variables for the evolution of weaving craft are structured in sequence listed below.

This study might identify Jamdani broadly as 'folk arts or crafts', exists in abundance. This is not going to be categorized as non-professional activity. Some professions satisfy the needs of the larger community, practiced by artisans of various denominations – potters, metal-smiths, leather workers, basket and bamboo workers, tailors, wood-workers, weavers. They work within an in-social communication nexus, refer to the artisans manufacture of utilitarian items, an interdependent network of activities that provide functions and services within local communities with its limited vocabularies and skill-demands, but with a remarkable breadth of sensibility and imagery and also regional and other variation. Some of the products find ways to the larger markets through the intervention of intermediaries. The subject of cottage industry of Jamdani lies in this background. They belong to socially and economically marginalized households, as in the caste system, 'lower' and 'out' castes were assigned the responsibility of essential manufactures, functions and services for the community and named the class of Bosak, means who ties the knot. For thousand years it was a critical and essential element for the village economy and its self-sufficiency.

When the number of artisans grew, in larger size of social grouping they established a neighborhood of their own which is very significant. Their visual and tactile connections with the land and with cultural ideas and identities help to define a sense of people and the place. Such artisan sector has in the past seen its enlightenment and peak of sophistication, as for instance the Dhaka Muslin (Banu and Reza, 2015). This was acquired through generations of masterly craft practices, which have become hallmarks of quality and superiority in handmade items. There was millions of Muslin artisans produced functional goods, which are related to the local life, tradition and culture but unfortunately extinct now as like its cotton (Tushar, 2006: 1-2).

Most importantly, a society in which folk arts are alive is a more colorful and creative society than one in which art activity is confined to a privileged few (Subramanyan, 1987: 57). Question is how far Jamdani reached? One example is Pocahontas, also known as Rebecca Rolfe (1595-1617), a female Native American from Virginia who was a negotiator with the English settlers. As one Rev. Whittaker narrates about an English delegates' meeting with Pocahontas, "He was dressed in a simple tunic of white muslin from the looms of Dacca" (Lossing, 1902: 99). As late as early 19th century, at a time when textile trade was at its lowest ebb in Dhaka, Muslins were still being used in Arabia's major cities like Jeddah and Makkah, even Iraq and parts of Mediterranean coastal countries. Earlier Dhaka Muslin had a monopoly in various trading zones of Asia, Europe and North Africa (Karim, 1965: 130). It may also be noted that the last influential Mughal Emperor Aurangzeb, was fond of Jamdani, for which he offered Rupees 250 per piece (Taylor, 1851: 48). The Greeks also used these finest cotton clothes from Bengal (Gilroy, 1845: 334). Kautilya's

Arthashastra (Book of Economy) mentioned the fine cotton clothes of Eastern Bengal were the best. It is also suggested that during the time of Ptolemy textile products of this region had a good reputation in Roman Empire and ancient Egypt. Arab geographer Sulaiman from 9th century, Moroccan world traveler Ibn Batutta of the 14th century, some Chinese authors of the 15th century, and Mughal imperial author Abul Fazl of the 16th century highly praised the Muslin of Bangladesh (Karim, 1965: 3-5). (Figure 15, 16)

Fig 15 Mughal princes wearing muslin, 1665 (source: Berlin Museum Island)

Fig 16 Maria Antoinette wearing muslin in 18th century (source: Wikipedia)

It is also evident in the writings of explorer Tome Pires, who was in India around 1510 AD described that people of Bengal who were very efficacious wholesalers and a large number of Middle Eastern wholesalers like Persians, Turks and Arabs established trade in the entire region (Peres, 2005: 88). Among them, merchants from Armenia lived in Dhaka for clothing trade and were very powerful landlords (Figure 17). But in the map of year 1735, one British cotton sweatshop was shown on Dhaka's Buriganga river shore area probably to strive with the traditional craft (Atiqullah and Khan, 1965: 6). This European business made the prestigious muslin craft vanished, as their cruelty is still evident in this region. For information, Dhaka municipality's almanac export of cotton goods and chattels during the 18th century through the British East India Company alone amounted nearly 30, 00,000 Indian Rupees. Again, Great Exhibition displayed Jamdani Scarfs in London in 1862; which means the value of this craft already reached to the rest of the world by greater waterway navigation (Iqbal, 2014: 19). The river system of the Delta greatly facilitated the supply of raw cotton, distribution and marketing of finished products. All the markets (called Aarongs) were, therefore, on the river banks (Allen, 1912: 7; Hossain, 2010: 141-144).

7.2. Geographical Indicator (GI) Concept

Cotton production was abundant in agricultural field around the zone between the Old Brahmaputra and Meghna Rivers. Here the earth is loamy and comprehends maximum moisture and warmth (Talukdar, 1987: 57). European voyagers advocated that the cotton produced naturally was of a superior sort and its fiber was called Desi (Hunter, 1877: 84). So, it's clear that river Shitolakhya and its geo-climatic settings with perfect environment confirmed Jamdani production only here which is not possible in any other province of India subcontinent (Ahmed, 2017: 48). Steps of weaving which were reliant on the veracious level of humidity and moisture, otherwise lack of humidity could be a cause of warp breakage, thus Jamdani was only possible to produce and maintain in this region (Basu, 1955: 75).

The definition of GI could be understood better by Section 2.9 of the Geographical Indications of Goods (Registration and Protection) Act, 2013 (hereinafter GI Act) runs as: "Geographical indication of goods means an indication of agricultural or natural or manufactured goods which identifies its originating country or territory, or a region or locality of that country or territory, where a given quality, reputation or other characteristic of the goods is essentially attributable to its geographical origin and in case where such goods are manufactured goods, one of the activities of either production or processing or preparation of the goods concerned conceivably takes place in such territory, region or locality."

Any GI should have three qualifications:
• Special characteristics or reputation attributable to its origin
• Territoriality (town, region or country)
• Traceability as scientifically proven (Islam and Habib, 2013: 66).

For information, World Intellectual Property Organization (WIPO) defines a Geographical Indication (GI) as "A sign used on goods that have a specific geographical origin and possess qualities, reputation or characteristics that are essentially attributable to that place of origin." Currently, there are at least 111 countries where GIs are recognized as a separate type of intellectual property with 'sui generis' protection act of GIs. Those are mainly agricultural products, which typically have qualities that are influenced by specific local geographical factors such as climate and soil. However, GIs are being increasingly used for natural or manufactured products such as handicrafts. GIs also serve as a tool to preserve heritage, traditional knowledge, cultural and artistic expressions. Social benefit, certain characteristics are the requirements to preserve the certification of GI goods (Bhattacharya, 2014: 3-6). However, one of the first GI systems is the one used in France from the early part of the 20th century known as- Appellation d'origine Contrôlée (AOC). World Trade Organization (WTO) first included Trade-Related Aspects of Intellectual Property Rights (TRIPS) Agreement under the multilateral international framework of trade dealing with the protection of GIs in 1995. Based on the agreement, different countries were given direction to prepare their own national laws based on that.

Paris Convention for the Protection of Industrial Property, (revised at Stockholm on July 14, 1967, 21 UST 1583, 828 UNTS 305 and enforced on 26 April 1970) where article 1(2) states: "The protection of industrial property has as its object patents, utility models, industrial designs, trademarks, service marks, trade names, indications of source or appellation of origin, and the repression of unfair competition". Later, article 2(1) of the Lisbon Agreement clarified "appellation of origin" that means the geographical denomination of a country, region, or locality, which serves to designate a product originating therein, its quality. Article 3 of this agreement contemplates wide protection for appellation of origin enumerating that "protection shall be ensured against any

usurpation or imitation, even if the true origin of the product is indicated or if the appellation is used in translated form or accompanied by terms such as "kind," "type," "make," "imitation", or the like" (Islam and Habib, 2013: 52-54).

Geographical Consideration: Jamdani has to be a unique name whose geographical location indicator must be Dhaka. In other words, Dhaka and Jamdani are synonymous. Greater Dhaka region was the earliest and sole site of Jamdani production; so Jamdani is automatically entitled to GI tag of Dhaka and does not need an additional description. Dhaka had many physical reincarnations in different historical periods, and we are not sure if Jamdani existed at a time when this region was yet to be named Dhaka. The origin of Jamdani could be traced back to the craftsmanship of Bengali mercantile community of the world renowned Sonargaon riverport in the 15th century (Iqbal, 2011: 38). The climate of Demra region is another justifying factor. Tropical monsoon with predominantly hot and humid summer and a relatively cold winter is perfect for Jamdani production. Topography of the land is characterized as plane land. Silt mixed black and greyish soil is noticed in the site because of the layered comprising of adjacent river delta (Figure 18). PH-value of the soil is 5.6 to 6.5 which proved perfect for Jamdani washing and dying (Hoque, 1984: 34). The region is within the monsoon climate zone, with annual average highest temperatures of 23^0 C from August to October, peak time for cultivating cottons (Dhakaweather, 2017). All above evidences suggests that Dhaka region was, and still is, it's only true center of production and will be in future as well.

Fig 18 Jamdani production is only possible for the presence of Shitalakshva River

Legal Consideration: To register Jamdani as a heritage product, it should be legalized from at least two vantage points. Firstly, the location and context is perfect for production of raw cotton. Secondly, ecological conditions for production of Jamdani itself are potential (Iftekhar, 2014: 12-19). The operational process of GI law can be done through the effective drafting of the implementing rules. Such provisions will prevent fraud whilst seeking protection, ensure effective monitoring and ease enforcement of the GI law. It must be done through an association or the cooperative and the operationalization process relates to the substantive partnership amongst a number of actors, e.g. government, producers and the enterprises since no individual can register for a product (Bhattacharya, 2014: 3-6). Jamdani Development Board, nominated as state

stakeholder, has been successful in acquiring a Geographical Indicator (GI) Certification that is seen as a weapon against extinction and enhancement of social awareness eventually.

Institutional Consideration: The process for the registration is done under the trade mark (TM) law. Because, private trademarks can be owned individually or by a group of people, GI products are perpetual collective rights owned by the concerned communities. TM can be transferred or assigned to another right holder but in GI products rights belongs to a nation. GI product may be protected by refusing or invalidating TMs that consist whole or part of a possible GI product which can mislead consumers about the real geographic origin of the goods. This kind of confusion may be erased in the member countries by persuading Article 22(3) of the TRIPS Agreement (Nation, 2011: 82). When GI is registered, government determines the quality and protection of that GI product under collective or certification mark to regime the risk of being genericize (Islam and Habib, 2013: 60). GI products can never become generic once registered and serves the functions of distinctiveness and consumer assurance as to quality (Caenegem, 2003: 699). Government of Bangladesh passed the 'Geographical Indicative Products (Registration and Protection) Act in the National Parliament on 5 November 2013. The Bangladesh government has to sign the Lisbon Agreement and Madrid Agreement in 2014. As a result, Jamdani Weaving listed as the Intangible Cultural Heritage of Bangladesh by the UNESCO in December 2013 and it was a great achievement for this country (Ghuznavi, 2014: 2).

8. Findings from Field Survey Questionnaire

The survey was conducted in Tarabo union in Narayanganj from 12 February to 16 February, 2020. For each question, 10 different persons of average age 35 had been selected carefully as respondents and they all were local by residence status (Table 3). It is evident that, 80% of the survey responded that this is the birthplace of Jamdani weaving and is the main factor of Genus Loci. 70% also recognizes that the River Shitolakshya is a vital fact of this geographical index crafting practice (Figures 19, 20). In the field survey, 100% respondents valued this as an identical craft tradition. This tradition is belongs such communal environment which was not possible without social cooperation as 90% believed so. Government of Bangladesh has already taken some good steps regarding some burning questions like land allotment particularly for the weaver community. 90% people gave their consent for such initiative. Again, 80% think Government has eased the loan policy, mainly the microcredit for the weaver society. Other factors like social awareness and advertising in media had constituted 30% of survey answer. The major problem they are facing today is weather conditions. 60% of survey opinion indicated natural calamities such as rain and lack of sunny days. The weaving off season is monsoon period stretches from May to September. According to the 70% respondents, the major problem is electricity supply and for load shedding, the production stopped at night. Some other problems include wage discrimination, high cost of production, and long duration of manual production, less investment, etc. The most significant finding of this research spotted an alarming future for this craft practice. 80% people don't want their children to come in this profession, from weaving to wholesale trade or shop keeping in a posh mall-they just don't want to involve their next generations. While only 30% people think their children should not choose profession as a consequence of responsibility. It is found that a lot of people from North Bengal are learning the skill but still working with minimum wage. The local people are at decision making stages but not in weaving.
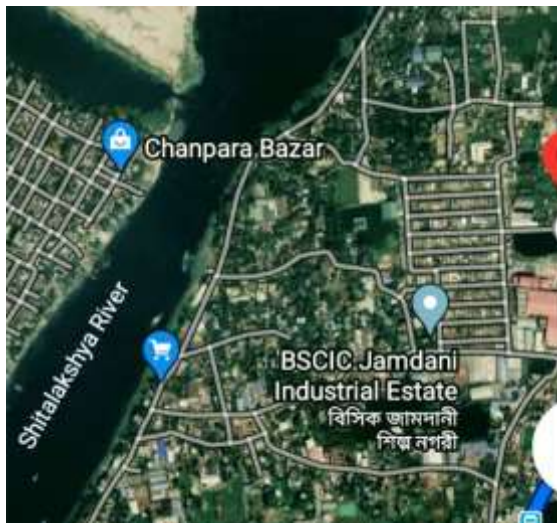
Fig 19 Wholesale market of Jamdani products in Demra region (source: Google Earth)

Fig 20 Factories of Jamdani production in Tarabo village (source: Google Earth)

Table 3: Questionnaire Survey

Serial no:	
Personal Data:	**a) Interviewee's name:** **b) Address:** **c) Age:** **d) Religion:** **e) Occupation:** **f) Sex:** Male / Female **g) Resident status:** Migrant / Local
1. What is the 'Cultural Value' of Jamdani?	a) Craft b) Hereditary c) Community d) Others:
2. Mention most current problems in the Jamdani industry? (On priority basis)	a) b) c)
3. What are the most significant initiatives taken by the Government so far?	a) b) c)
4. Can you maintain livelihoods with the earnings of Jamdani weaving?	Answer:
5. Do you want your children to get involved with this profession? Why?	Answer:
6. If not; how will Jamdani craft survive in near future?	Answer:
7. Suppose, you were given chance to improve your community, what will you do first?	Answer:
8. Anything I missed? Please provide your own opinion:	Answer:
Signature and Date:	

For future betterment of the craft, 90% of them said that the Jamdani production needs to be increased as to satisfy todays demand. On the other hand, 60% people are interested to form a weaver welfare organization with the power of legislation of their own. 30% of the respondents demanded an easier loan policy for the weavers. The survey questionnaire also left some options for the respondents to give their own view regarding future plan and one surprising proposal came out, to tackle the uncertain future the community suggests a lifelong pension for the weavers after the age of retirement, generally at age of 65 here in Bangladesh (Miyan, 2017: 13). The survey respondents are satisfied with suppliers and distributors of raw materials. They said that main raw materials for hand looms are yarn, dye and other chemicals. Cotton for yarn is provided by government but dyes and other chemicals are generally supplied by independent private retailers and suppliers. The prices for these are more or less constant and it depends on certain market mechanisms.

And finally, a shocking reality came out by conducted survey. These people, once were the backbone of the village's economy, are abandoning their traditional occupations for survival. Some have already lost or on the way of losing their livelihoods. For their uncertain careers, most of these weavers have changed their livelihood. Their most attractive destination is RMG sector. Other options are also available like collecting fuel oils and selling them in black market, making cigarettes, pulling rickshaws, or hawking beside the roads, leather workers, metal workers, shoe makers and so on. On the other hand, those who cling on desperately from their dedication for this inherited profession are amongst the poorest of the poor in the society (Figures 21-26).
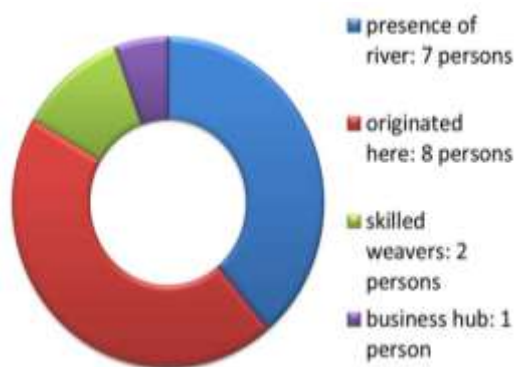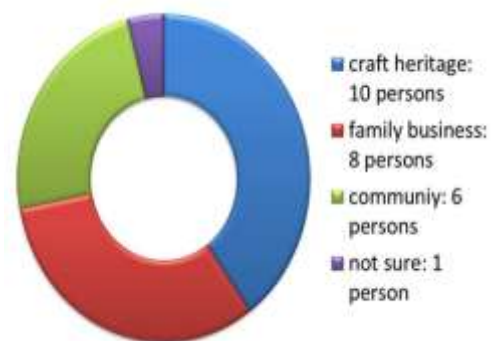

Fig 21 Why Jamdani originated in this region?

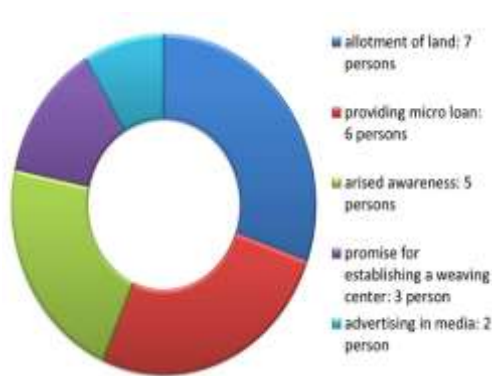**Fig 22** What is the value of Jamdani?

legend:
- allotment of land: 7 persons
- providing micro loan: 6 persons
- arised awareness: 5 persons
- promise for establishing a weaving center: 3 person
- advertising in media: 2 person

Fig 23 Effective government initiatives

legend:
- lack of electricity: 7 persons
- adverse weather: 4 persons
- low investment: 2 persons
- old mechanism: 2 persons
- high cost of production and transformation: 3 persons
- wage discrimination: 9 persons

Fig 24 Current major problems

legend:
- own governing body: 7 persons
- exploring markets: 6 persons
- launch a welfare trust: 4 persons
- introduce micro loan: 5 persons

Fig 25 Future demands

legend:
- yes: 2 persons
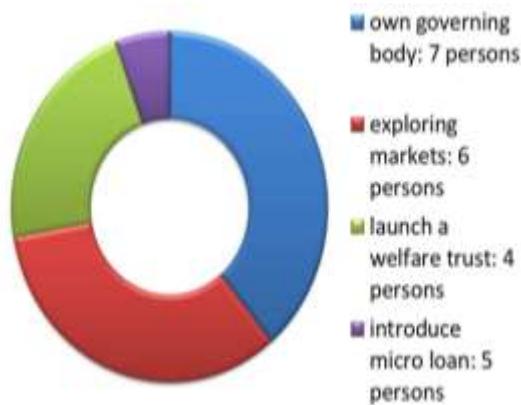- no: 7 persons
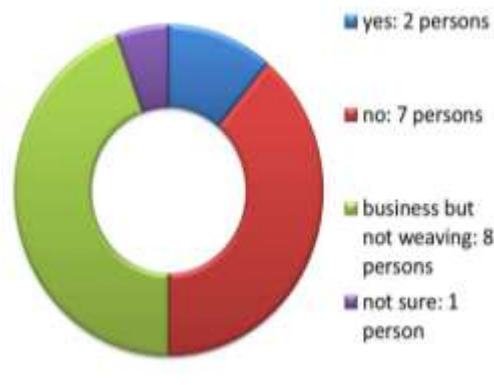- business but not weaving: 8 persons
- not sure: 1 person

Fig 26 Next generation get involved

9. Analysis

9.1. Social Structure

Staggeringly it is noted that in Demra and Tarabo region, the craft of weaving sustains more than half of its population, almost 226,679 people in Area: 22.4 km² resulting a Density of 10,129/km² during the census of 2011 (BBS, 2012; Census, 2012). The handloom workshops of these weavers are generally concentrated in the outer periphery of the villages. The physical survey found that production of Jamdani is traditionally a family business. Here entire families are skilled in the production of the fabric and typically, different family members engage in different activities like dying, weaving and designing, which justified all of them as a single crafting community. Different members of the family get involved in different stages of Jamdani production. Master weavers' sons/nephews work as helpers and learn the family business. Through generations there has not been any change in the pattern of hereditary and division of labor. In some cases, it is found that a master weaver is the owner of a weaving unit who seldom sits on the loom. The sons or daughters of the master weavers (Mahajans) are hardly present on the units because they have fear for becoming socially down-graded (CPD, 2014). Fortunately, most of the weavers are still living just

above the poverty line and hence have appropriate resources to even purchase raw materials related to production.

9.2. Gender Inequality

Young women with relatively low skills comprise a high share of employees in the weaving industry, which is often one of the few accepted forms of predetermined labor for women in developing country like Bangladesh. In this country, women represent on average 68 per cent of the workforce in the clothing industry, 45 per cent in textiles (Fontana, 2013: 12-34). Informal and home-based household work is more common among women than men. Long and unpredictable working hours and safety concerns make it difficult for women to combine family responsibilities with work (Figure 27). Low wages, weak collective bargaining opportunities and lack of equal pay for work of equal value can make women vulnerable to exploitation inside and outside the workplace. Poor or non-existent maternity protection and various forms of violence, abuse and harassment are still present. They are less prioritized in weaver society as they work with low wages, lacking education and have less knowledge about marketing and designing. Many initiatives are badly needed to improve female workers situation.

Fig 27 Women at work, Jamdani weaving

10. Discussion

10.1. Opportunities

1. Jamdani should be showcased in the national and foreign museums. Research work needs to be continued side-by-side. Bangladesh's embassies all around the world should start diplomacy with giving pieces of Jamdani to the heads of the states to create global awareness. A very positive and favorable aspect for Bangladesh in the international business is the only country in South Asia that has a positive relation with each and every other neighboring state in this region. And as there is a big demand for Jamdani, improved trade exchange would be very useful to grow our market of

hand loom products in a competitive world. For better and ease of export, development of the internal road network and business communication system needs to be upgraded.

Besides, since most of the GI goods have their origin in rural areas, increased business under the GI Act will enhance the income of the Jamdani weaver community and contribute for rural development (Das, 2009: 35). As a developing country with strong agricultural sector, GI law can be an important public policy tool for economic development and better livelihood of skilled craft practitioners (Rangnekar, 2010: 77–80).

2. Nobel Prize winner Grameen Bank Model can solve the problem with micro credit loan for improving financial situations of the weavers. Foreign investment is also needed to be attracted and there is huge opportunity of that because Bangladesh has vast population which can provide cheap labor if they are trained well. In fact, skilled workers of Bangladesh in terms of delicate hand works are historically praised all over the world. For training and human resource employment, strong NGO base of Bangladesh will definitely be helpful for this labor sector to cope with the possible huge demand for Jamdani products in local and international market.

3. Advantage of Jamdani production is, its cheap raw materials are available all year round and simple machineries are used rather than imported heavy equipment of garments industry. The industry is not harming the natural environment that much as it is more or less a manual industry with less use of chemicals and lubricants.

4. The Jamdani hand loom industry has made a big impact on the rural societies in north Bengal. Areas like Shahzadpur, Pabna, Belkuchi, Ullahpara have developed into business sub hubs oriented to Jamdani industry and marketing. For the example of Shahzadpur area in Sirajganj district, many side businesses have also developed centering this handloom industry (Rahman, 2013: 14). Unemployment has been reduced to a great extent in these areas; such marketing model could be implemented in less progressive areas of the country like south Bengal. This has made positive change on the society as a whole and the number of anti-social activities like hijack, loot, robbery etc. has reduced a lot in the last two decades.

5. There are still huge group of customers who value the Bengali costume heritage. There is huge demand of Jamdani clothes and fabrics for the craft's distinct style and Jamdani is quite popular for fusion and fashion experiment among the top fashion houses like Rang, Aarong, Deshal etc. Normally, customers buy those hand loom products which have delicate knit works, are artistic, exquisite and elegant in contemporary lifestyle. Demand for products is influenced by seasons. Generally during Eid, Puja and wedding season (last quarter of the year), the demand for hand loom products go up exponentially, which have great share in country's revenue as festival economy.

10.2. Challenges

1. Due to lack of emphasis, subsidy and education on creative skills and heritage-linked economy; several craftspeople, domain experts and entrepreneurs are not harnessing their full potential. Consistent and sustainable investment sources are absent despite market demands. Unwillingness for adopting advanced technology, less government investment, high interest rate of banks to start a new business and most importantly, political instability actually hampers all kind of action and development plan. In an adverse situation, this potential sector had never been organized under a proper framework of development planning.

2. Moreover, the proven climate, cotton and water- which all were suitable for Jamdani weaving, do not exist in their best conditions anymore. Whether if such type of question arises then how issues with authenticity and integrity will be dealt regarding the GI registration? That might go against Bangladesh for showing indifference in taking proper action.

3. Another fact is, elderly people have retired and no skillful generation is preparing to face challenge of upcoming future. The younger generation has been really losing touch of their traditional and cultural heritage, becoming less and less devoted and concerned. They are migrating to urban areas and shifting professions. If it continues then we will not find enough manpower to run its production.

4. Weavers are suffering from inadequate payment and lower social status, and it demoralizes them if markets seek original excellence and distinctiveness of the craft. The weavers have to work for almost 60 hours per week (Rahman, 2013: 14). The conditions inside the working units are very poor, there are not even ceiling fans and proper ventilation while summer is very hot and humid in Bangladesh (Figure 21). Compared to the preciseness and difficulty of work and less facility, the wage that they earn is also very insufficient. Most of them get within the range of Tk 2,500 – Tk 3,500 monthly without any additional allowances like lunch money, health allowance etc (Chaiti et al. 2013: 3).

5. Garments industry of Bangladesh is the world's second largest production house for readymade clothing. This new economic and industrial order introduced in the decades of 80's (Pri.org, 2014) and backed by big budget and aggressive marketing by the patronization of both the government and private sector. Influx at industrial unit made clothing, successful adaptation of contemporary and cheaper imported goods into the total system as huge mass production and most importantly, monopoly of elites- all ensured its triumph. During that period, the employment in the RMG industry of Bangladesh increased by 40%. For any RMG workers, the basic is minimum Tk 7,000 for monthly salary and they have better working environment too (Harley and Faiz, 2007: 17-23). Here they need not to perform delicate tasks like the weavers or these sectors do not count their expertise or skill levels as weavers, vice versa. The fresh workers in the job market are rushing for the secured and less industrious job like RMG sector with better wage system. That's why Jamdani marketing spots and production houses are generally in shortage of skilled workers.

6. Current production of Jamdani is very complex to manage because multiple actors of various sizes need to serve geographically dispersed locations while production includes numerous steps and activities that must be performed in sequence but within a limited time frame (Fernandez-Stark, et al. 2011: 1-12). Furthermore, such industries are characterized by high volatility with low predictability (Bruce and Daly, 2006: 329–344) with low profit margins (Bruce et al. 2004: 151–170).

7. In the modern age, the clothing trend of the country is being largely westernized. Globalization help bring the countries together into one single nation, foreign cultures are spreading rapidly and gradually making their presence felt in the choice of apparels among Bangladeshi consumers. Western outfits have penetrated the Bangladeshi market a lot and has adversely affecting the local craft like Jamdani, which are being dissipated and blunted over time.

10.3. Recommendations

1. Minimum wage for Jamdani weaving should be equal to RMG sector as it is less prone to quick shifts in production locations, production is capital intensive, handling processes require access to large amounts of energy and natural resources and in fact, generally require a more skilled workforce. Jamdani industries were not governed by a global trade agreement in Bangladesh (GGD forum, 2014) it's time to introduce such concept in this country.

2. Authorities should be under the same umbrella and an effective incorporation between Ministry of textiles and jute with Ministry of industry is necessary for that. Bangladesh Handloom Board (BHB) was established in 1977 as a Statutory Public Sector Organization under the

administrative control of the Ministry of Textiles and Jute (BHB website, 1996). Though the board continues to work for the development of the industry and took some responsibilities including render weaving services and supply working capital to the weavers, increase the popularity of handloom fabrics and extend possible markets. But most of the rural based entrepreneurs are unaware of it, even existence of the body. As a result, they are not able to reap the benefits out of it. Additionally, the Geographical Indications Unit at the Department of Patent, Design and Trademarks under the Ministry of Industry is now acting as the superintendent authority in Bangladesh for GI registration. There shall be a seal of the Geographical Indications Wing of this office and the seal must include words "Registrar of Geographical Indications, Bangladesh." Impressions of such seal shall be judicially noticed and admitted in evidence (GI act, 2013).

3. Another important thing is, we all know that Yarn is the primary raw material and made out of fibers such as cotton. In most of the cases, yarns are homemade and produced side by side in the hand loom units. Cotton generally supplied through a government regulatory organization named Cotton Development Board; because almost all of the cotton cultivation in Bangladesh are monitored by the government. In fact, increasing investment from private sector will be effective as government solutions will not be sufficient to handle all the problems thus some sectors could be distributed for privatization. For micro and small scale enterprises, government should offer special package of incentives where management and monitoring should be shared by each stake holders. Agencies could be then invited in a specified framework of private - public partnership. This will uphold a joint hand of weavers- workers – entrepreneurs, indeed.

4. Jamdani is lagging behind in terms of technology. Most of the handloom units are installed over mud base and made up of manual wooden machines. Functioning of these machines take a lot of time and their productivity is also low. Many improved technologies have been discovered and are also used in the urban units of Narayanganj which could be introduced at Demra with experimental basis. But at present working units, where other favorable factors are present, it is not able to use full potential of the market. The productivity could be increased if use of advanced technological machineries increased. If not equipped enough, they should introduce automatic or semi-automatic loom to come out of low rate of production.

5. For promoting various patronizations and creating proper platform based on institutional marketing system, a Jamdani handloom marketing-come-display center could be launching at Demra region. Establishment of common facility center is now demand of time. The main aim of such project should be transforming Demra area as economic landscape through creative clusters, cultural organizations, designer groups and craft guilds in specific places. Besides, a training center will also be established under the overall master plan of development. It has to be designed to combine training, product development, upgraded marketing policy and research on product types, dyeing technology and printing, documentation and publication for further research on Jamdani products.

11. Conclusion

It is heartening that the Government has taken very important step to conserve Muslin's ancestor Jamdani after a long run. Such master plan should have proper framework and program contents for further development of the weaving craft in order to ensure social and economic security. Regular dialogue should be arranged to bring together legal experts, relevant government officials, eminent fashion designers, trade, textiles and craft experts, academics and representatives from the media and the civil society. This study suggests geographical index, GI should help to blend various craft cultures as an educational platform. At the present situation, cloths of traditional Jamdani designs

are gradually losing their efficiency to meet ever increasing market demand with modern zest, contemporary designs and customer's preferences, which is actually disturbing for its tangible values. To train the poor and marginal handloom weavers in a sustainable manner, 'Innovation and Redesign' of traditional lifestyle could be revived by keeping in the mind; that the preference of the consumers may bring new life of craft study and as well as community development. On the other hand, if trained to cope with next era challenges, a large number of expatriate skilled handloom weavers may arrive in the next generations to continue our national pride. The Jamdani weavers all over the crafting settlements in Demra community will be frontline warriors for that achievement, there is no doubt.

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Infographics and Routing of Tourism Sites of Tourist Cities

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Abstract

The contemporary world is a space full of messages, and information that is exchanged constantly. All the urban visual effects (whether in open spaces or huge images, or in closed public places), have a special visual expression power that defines how they can be used in the field of environmental graphic design. Large and tourist cities face many problems. Problems related to tourist may arise in communicating tour guide such as the weakness of the information system in identifying tourist sites, the lack of adequate facilities on sites such as maps, movies and educational boards. In tourist cities, one observes that environmentally graphic elements is not used and have no vitality and designed related to the urban texture. The present study, attempts to design and present a model based on informative environmental graphics to determine the specific route of tourism in order to know the space of urban tourism sites. Considering that the purpose of this research is to use the capabilities and functions of environmental graphics in the historical space of tourist cities and finally to provide a model to determine the routing infographic, so in terms of purpose it is practical - development. When studies done related to the scientific principles of environmental graphic design with aesthetic language as an effective tool in facilitating the routing of tourists and paying attention to special tourist routes, it is also based on descriptive-analytical research method. The environmental graphics at Naghsh-e Jahan Square do not respond to the rapid growth and development of this tourist site. This is because in many cases not only it does not convey information to the audience, but causes confusion and difficulty. Most of the environmental graphic factors in Naghsh Jahan Square are not in their proper place and therefore have lost their features and have only made this space more crowded. Therefore, with the proposed model of this research, domestic and foreign audiences can become more familiar and use the facilities and attractions of tourist sites.

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1. Introduction

Today, the tourism of historic cities is one of the most important tourist activities in the world, with its rapid growth has become multi-purpose. The development of tourism and related entertainment will be effective factors in shaping the pattern of historical areas development and their historical heritage and will provide economic, social, cultural and environmental benefits for tourists. Ancient monuments in historical cities are an integral part of the city structure and the destination of many commercial trips, tourist, recreational and cultural (Timothy and Wall, 1995). Meanwhile, cities with ancient textures, due to the existence of elements and valuable historical spaces such as bazaars, caravanserais, mosques, Hosseiniyahs (or worship places), etc., can attract many foreign and domestic tourists as a suitable place (Khakpour and Kamandari, 2014). One of the most important steps in determining the urban tourism space is to determine the specific tourist routes. It can be said that, the urban tourism space is a space where tourism resources are located and the behavioral model of tourists is a function of components such as attractions, accommodation, facilities and services, which is very important in how to access and navigate these components in tourism space. So the signs of access and routing as infographics should be located on the routes of walking and passing tourists. One of the powerful tools in building culture and influencing citizens' public opinion that belongs to environmental graphics. The contemporary world is a space full of messages, and a lot of information that is exchanged constantly. Everything that is used with the help of visual elements and the use of extensive knowledge of the visual arts and the use of fine arts facilities in the community and attracts the attention of the audience is in the field of environmental graphics (Abdolhosseini, 2006). Based on the latest scientific research, informational billboards should be interesting in terms of aesthetics and effective and implementing in the field of communication (Norouni, 2005). Therefore, to complete the definition of environmental graphics, it should be considered as one of the main pillars of social and urban life. The presence of design and visual arts in everyday life is possible through environmental graphics. Environmental graphic is the most effective tool for influencing the behavioral patterns of urban human life. Environmental graphic is a community phenomenon that can be analyzed with respect to visualization space, national, ethnic and cultural features, social agreement, ethical and traditional, and political and economic branches of the society (Abdolhosseini, 2006).

2. Literature Review

Study by Movahed et al., 2002, recognizing the model of Isfahan's tourist space using GIS system, has analyzed the characteristics of Isfahan's historical texture and the problems caused by the pressure on this texture using GIS and points to the need to pay attention to the central part of the city.

Providing a spatial model for determining the specific routes of urban tourism (e.g. Shiraz city) (Heidari Chianeh et al., 2014). This dissertation has analyzed the behavioral patterns of tourists in choosing tourism routes. In this study, optimal tourism routes have been proposed by changing the tourist behavioral pattern in prioritizing travel and selection attractions.

Identifying and evaluating the problems of ecotourism guides (Case study: Ecotourism guides in Tehran province), by Hashemi, et al., 2014. In this article, the researcher seeks to answer the

question that what problems exist for the activities of ecotourism guides and how important each of these problems is according to the guides.

Locating tourist site in Bandar Abbas to create a tourist atmosphere by (Taheri Bajgan et al., 2014), studied the tourist site location in Bandar Abbas city to create tourist atmosphere using Analytical Hierarchy method and GIS and assessing the geographical layer of Bandar Abbas. The main challenge in urban tourism management of Bandar Abbas is the lacks the appropriate standards and criteria for the construction of tourism sites.

Investigating the Influential factors of interactive banners on tourists (Faiz et al., 2014), examined the effective advertisement of interactive banner to attract foreign tourists and the statistical population was the international tourists who have experience using the Internet.

Review and Evaluation of Urban Tourism Sites (Case Study: Urmia City) (Hataminejad et al., 2014). The study examines the tourism sites of Urmia using tourism criteria.

2.1. Distinguishing the Present Study with other Studies

After reviewing and analyzing the sources and research background on spaces or tourist sites with tourist attractions, it was observed that in some research, is in connection with the importance and necessity of determining tourist spaces, recognizing the model of tourist space, spatial model to determine specific tourist routes, identifying and evaluating the problems of ecotourism guides, and optimizing the establishment of infrastructure and facilities to these spaces, but there is no statement regarding the role of environmental graphics in facilitating the routing of tourists in these spaces. Since the tourism industry has service nature, therefore has the fundamental role and importance of tourists in the quantity and quality of services provided. The issues related to environmental graphics in tourism and infographic routing play an effective role in guiding and meeting the needs of tourists. In the present study, by prioritizing to informational patterns in tourist routing in the city, an attempt has been made to provide a framework for determining and designing the tourist movement pattern, to determine the optimal infographic in the tourist routes.

2.2. Research Objectives

In the present study, the following objectives are considered:
- Studying the functions and scientific principles of environmental graphic design with aesthetic language as an effective tool in facilitating the routing of tourists.
- Expressing the necessity and importance of paying attention to the access process to sites and special tourist routes.
- Providing a model for determining the infographic in facilitating the guidance of the tourist to special tourist routes.

2.3. Research Questions and Hypotheses

Explaining the key research question, sub-questions which express the structure and various aspects of the key question and indicate the dimensions and variables of the research; also, the expression of research hypotheses with news sentences:

1. Today, in the historical cities of Iran, how to determine the information of special tourist routes? And what are the parameters and criteria in this process?

2. How do the existing infographics in Naghsh-e Jahan Square meet the needs of domestic and foreign tourists?

3. Methodology

This is an applied-developmental research in terms of purpose. In the present study, the analysis of urban tourism routes was done using the descriptive-analytical method. The research process is such a way that the necessary information has been collected with the help of library and field studies.

Considering the purpose of this research is to use the capabilities and functions of environmental graphics in the historical space of tourist cities and finally to provide a model for determining the routing infographic, so in terms of purpose it is applied-development research. When the study aim is related to the scientific principles of environmental graphic design with aesthetic language as an effective tool in facilitating the routing of tourists and expressing the necessity and importance to special tourist routes, it is also based on descriptive-analytical research method. The statistical population includes all tourists who visit the historical and tourist sites of the city, and field observation evidence the number of routing infographics that are available to guide them to the desired sites. The case study is the Naghsh-e Jahan Square of Isfahan as tourism sites.

After conducting the field observations, photograph and documenting the current situation of the routing system and information billboards and routes in Naghsh-e Jahan Square, an attempt was made to provide an optimal model of environmental graphics in routing and informing the locations of Naghsh Jahan Square. Therefore, based on the data extracted from the current situation of the field environmental graphics in the form of documents, first all the dimensions of the environmental graphics routes in the form of field observations and images were examined and described, and then the pathology of each these available information elements based on standard graphical environmental patterns were examined.

Meanwhile directly observing the mentioned area and the main routes that lead the tourists to record the documentary, by considering this point that the subjective issue of environmental graphics was informative and routing has used photography and field observations as important tools in field survey, especially in the field of Naghsh-e Jahan Square, and focusing on its importance in urban research and studies. Noting down the observations was another tool used to record observations. The preparation of the research area sketch was another measure to record information from Naghsh-e Jahan Square, which draws the three separate axes that end at the destination of Naghsh Jahan Square from three different sources and follow the paths of Naghsh Jahan Square. Maps are provided to better percept the research area and to determine what quality is the information infographic and route in the routes for the tourists who intend to enter the Naghsh Jahan Square, and visit its various parts and then exit from the place.

Finally, the use of infographic information and routing in guiding tourists to Naghsh Jahan Square was analyzed. Consequently, the author's observations of the current information graphics in Naghsh-e Jahan Square routing were expressed in relation to the basic components of environmental graphics, and the infographic study and routing in Naghsh-e Jahan Square as a tourist site was assessed. Continuation of the analysis in order to prove the research hypothesis: Informative graphics (infographic) in a dynamic and creative way in a compatible action that can be perceived directly with the environment and through this the audience can find information about places and routes without wasting time and to be guided in the right direction, field observations of the current situation of informational graphics in Naghsh Jahan Square, as well all routes from Isfahan that end to the square were discussed as case studies. In the end, by presenting the images in which, in order to facilitate the guidance of the tourist toward the paths of Naghsh-e Jahan Square, a review and an appropriate model were suggested.

4. Theoretical Foundation of Research

Since today the inhabitants of cities are facing lot of images and patterns, they will have difficulty in finding their paths without the help of clear graphic images. An environmental graphic artist who works with architectural engineers and traffic planners to create simple and comprehensive images of destinations is required to organize urban chaotic images with the right marking techniques. Based on the latest scientific research, informational boards should be interesting in terms of aesthetics and effective and applicable in the field of communication (Norouni, 2005).

Environmental graphics tries to help different science, such as urban landscape design, industrial design, sociology, communications, and scientific technology, to present new and creative experiences of space and form to the audience in order to create the best function in terms of communication expression and aesthetical values. Generally, the environmental graphic of each element is considered as one of its main elements; and the identity and nature of the place should be pointed out in the design of symbols, selection of letters, execution and materials and final structure. Also, idea, thought, and visual element in dynamic and integrated relationships serve to express the index and functions of the desired environment and convey their thoughts and content to the audience (Rashvand, 2014).

4.1. Routing

To the set of signs that guide us in choosing the best routing and origin and destination, transportation, and traffic challenges, is called as the navigation system. Some elements of this set are signs, text, and some are visual that has a direct relation to the subject and others have abstract designs. This set of signs and symbols can be a substitute for asking verbally from individuals about the destination. In designing of this type of sign, what is very important is that the clarity and simplicity of the rapid transfer of information, and the more ambiguous the sign, the more unsuccessful is the result. A variety of navigation signs can be informative, identifying, educational, legal, or promotional (Rashvand, 2014).

In designing the Santa-Monica city routing system, the constructive elements of urban visual identity such as colors and signs of the city have been used in a desirable manner. In this system, along with background welcome signs and place introduction, have used new signs of the city, fonts and colors of its visual identity. In addition to creating harmony in the graphic elements of the city, these signs are used as media to promote the visual identity of the city (Sedaghat and Khezrian, 2017) (Fig 1).

Fig 1 Santa-Monica city routing system, designed in harmony with the components of the city's visual identity and utilizing the city sign in its design. (Source: www.sussmanprejza.com)

What is very important in the visual performance of environmental graphics is the method of presentation and how to design a set of visual factors in the final context and structure, and the capabilities and values of expression, depends on the form of presentation in the environment. In an environmental graphic set, all the visual expression values refers to the nature and meaning of the place and in relation to it takes a unique shape. From design to implementation stage, it should be with an approach to the space and environment of the goal and express their identity and content. The concept of identity is focused on the ability to re-recognize and generalize all visual elements to the content and index of the intended place in order to obtain the characteristics and personalities of each set and place, independent and unique expression. The visual identity of a cultural and educational complex should express the concepts and values appropriate to its content and function. In complex and industrial factory, all the elements that form the environmental graphics must be subjected to its function and concepts, and each element in the association with another element must create a unified and integrated set affected by its subject so that various visual factors in the audience's mind points to the meaning and related continuous results (Rashvand, 2014).

Fig 2 ACMI Cinema Complex of Australia. (Source: www.environment.com/acmi-signage)

5. Case Study

Isfahan is a city with many tourist attractions and a rich historical and cultural background, which has always been as one of the tourism hubs of the country, and Naghsh-e Jahan Square has been selected for the present study. Naghsh-e Jahan Square consists of four main elements: the Abbasi Grand Mosque, Sheikh Lotfollah Mosque, Aali Qapoo Palace and the Caesarea Gateway, and the pavilions that make up the body of the square (Fig 3).
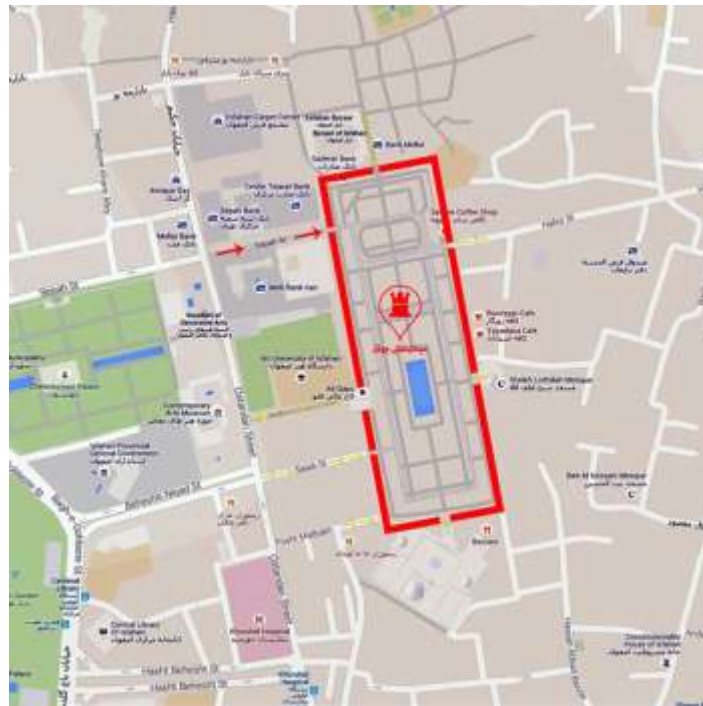

Fig 3 Naghsh-e Jahan Square of Isfahan (Source: Author)

6. Analysis of Contemporary Graphical Environment in Naghsh-e-Jahan Square

6.1. Contemporary Entrances to Naghsh-e-Jahan Square

At present, according to the new passages that have been created, it is possible to reach the Naghsh-e Jahan square on foot from 15 points (Fig 4).
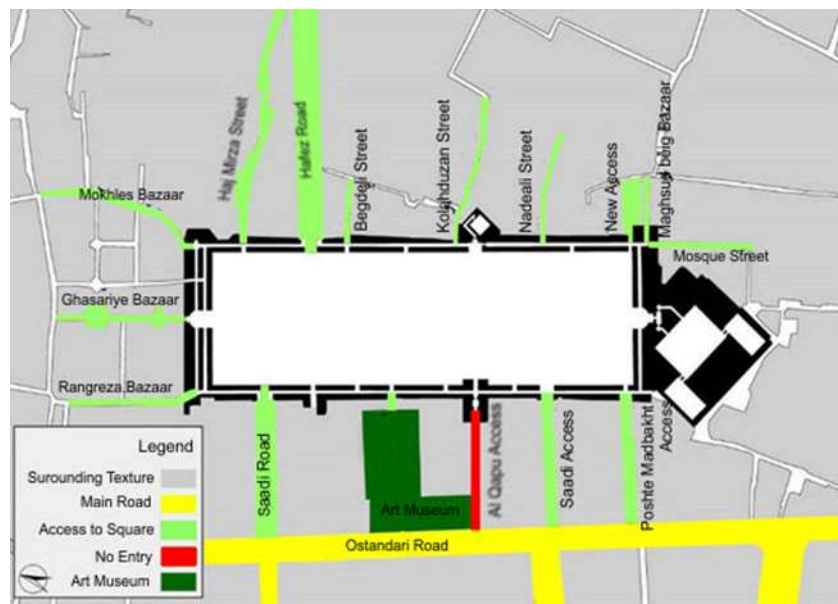
Fig 4 Fifteen access routes to Naghsh-e Jahan Square (Source: author)

7. Research Findings

7.1. Problems of Environmental Graphic Information and Routing of Naghsh-e-Jahan Square

In addition to analyzing on the cases done, the problems of this historical location can be categorized as in Table 1.

Table 1 Problems of environmental graphic information and routing of Naghsh-e Jahan Square (Source: Author)

Functioning of standard information and navigation systems	Environmental graphics status of Naghsh-e Jahan Square according to field observations
Audience ease of accessibility	- Naghsh-e Jahan Square signs are mostly installed at the main entrances of the city. - Route signs are not installed near the square and it is not easy to access from the middle of the city. - Two-name signs (Naghsh-e Jahan and Imam Khomeini) cause misguidance. - Tourists cannot be guided in the right way from the start to the end of the route in Naghsh-e Jahan Square. - Proper information and introduction in the Square with creative methods does not create motivation and desire to be present in the place. - Routing is very time consuming.
Installation of navigation maps in the initial locations and entrances of the desired spaces	- No map or navigation system has been installed in the entrances of Hafez and Sepah streets. - Entrances lack any elements and symbols of environmental graphics. - No information system is observed so as to provide the Square space in a comprehensive and visual way, to help navigation, to determine the

	route and to show the important elements of the Square in the image. - At this point of the entrance to the square, the tourist has no idea or image of his position in this space.
Installation of posters and direction signs in suitable and visible places and at appropriate heights	- There is no sign poster or information system inside the open space of the square. - Using paper for information and routing. - The signs have been erased or removed by the shop keepers and have no element for routing. - A number of sidewalks do not have names and signs. - In many cases, the distance between the installation locations of the signs on the street is longer distance and confuses the address seeker. - The installation location of billboards has been done without paying attention to the correct standards.
Simple and clear design of signs	- Numerous information signs do not coordinate in design. - In the design, there is no special and creative sign that indicates the historical and cultural identity of the Square.
Simple and readable fonts for the general public	- Traffic signs and multilingualism are not in good condition in the square. - The dimensions of the billboards and their writing are designed without considering the perspective view. - The posters do not follow a harmonious writing pattern. - The fonts of the billboards are different from each other.
Correct and understandable use of signs and text together	- Signs and text do not follow a specific design system. - In the Square space, no design has been done so that information and messages are not conveyed in symbolic language, signs and text.
Clear and distinctive color and related to the concepts and goals of the place	- The colors of the billboards are not designed according to a pattern in accordance with the cultural and historical atmosphere of the Square. - Sometimes the billboards appear in the form of white backgrounds, blue font and orange lines, and elsewhere in the form of neon signs with a completely different system and without consistency. - There are different types of billboards with different colors, dimensions and text for passages.
Proportion of the type of structures used should be in line with the characteristics and geography of the environment	- The material of furniture, furnishings and urban equipment in this entrance include trash cans, benches, long green bars, speakers and other item are not in harmony with the characteristics of the Square and have distorted the view of the entrances. - The entrance walls has been damaged and repaired with uncoordinated materials. In this entrance, poor designs and the way they are

	presented have created a lot of visual disturbances that these visual chaos severely disrupt the mental security of the audience. - The enclosing enclosure of entrances consists of modern commercial shops and unrelated to the Square space and forms a completely different business route with the historical identity of the Square. - The material of the environmental graphic elements in the Square does not induce the historical atmosphere and does not correspond to the identity of the site.
Organizing the maps according to the function of the environment	- Information of historical location guide and the quality of written information, providing location maps and multilingual signs for foreign tourists are not seen in the Square. - There is no specific and independent guide Square under the title of guidance and information system. - The site space shows the lack of a guidance and information system that shows a strong and significant connection between Naghsh-e Jahan Square and the ancient texture around the square, which is reflected in the index paths and pedestrian accesses to the Square.

In view of the above mentioned text, unfortunately, informational and routing environmental graphics in the historical texture of Naghsh-e Jahan Square, without considering the culture, historical space and tourism, and with a small number of elements of urban furniture can be seen as inconsistent, consequently does not induce the traditional, cultural and historical identity of the space.

It should be admitted that, the beauty element, as the most important factor in creating space and urban furniture, has received less attention on this site and in some cases has been neglected. Informative and routing environmental graphics patterns are as old-fashioned, distorted, without aesthetic pattern, diverse, misleading. The predominant aspect of these elements is consumerism, which, in spite of principles of aesthetics, has somehow disturbed the visual order and aesthetic of this Square.

Today, the environmental graphics of Naghsh-e Jahan Square cannot respond to the rapid growth and development of this tourism site. Because, in many cases, not only it causes confusion and difficulties but also it does not convey information to the audience. Most of the environmental graphic factors in Naghsh-e Jahan Square are located in their proper place, and therefore has lost their properties and has only made this space more crowded. Therefore it is necessary to think for a solution as soon as possible.

8. Conclusion

As mentioned above unfortunately, informative and navigational environmental graphics in the historical texture of Naghsh-e Jahan Square, without considering culture, historical space and tourism, and with a limited number of urban furniture elements can be seen as inconsistent, consequently it does induce the traditional, cultural and historical identity of the space.

It should be admitted that, the aesthetic element, as the most important factor in creating space and urban furniture, has received less attention on this site and in some cases has been neglected.

Informative and routing environmental graphics patterns are old-fashioned, distorted, without an aesthetic pattern, diverse, misleading. The predominant aspect of these elements is consumerism, which, in spite of many principles of aesthetics, has somehow disturbed the visual order and beauty of this Sqaure.

The present environmental graphics of Naghsh-e Jahan Square cannot respond to the rapid growth and development of this tourism site. Because, in many cases, not only it causes confusion and difficulties but also it does not convey information to the audience. Most of the environmental graphic factors in Naghsh-e Jahan Square are located in their proper place, and therefore has lost their properties and has only made this space more crowded. Therefore it is necessary to think for a solution as soon as possible.

Since the research problem was to determine the infographic pattern of the city's tourist space and to organize the tourist routing spaces along with the visual features of the infographics for the audience who are not very familiar with the social space and language and tourist place, therefore, the author has proposed model, so that the domestic and foreign visitors get familiar with facilities and attractions of tourist sites as much as possible and to utilize them.

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Comic Strip Design of Qajar History with Emphasis on Tea House Paintings

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Abstract

Structural similarities and differences in the visual expression of two artistic methods, i.e., tea house painting and comic strip art as new and emerging branches in the contemporary world are very significant. Comic is the art of narrating themes via images. Comic strips are parts of history, momentary memories and without an extensive burden of semantics that helps the reader's or viewer's imagination to go through in the desired directions. It is actually an art that highlights the story and executes it according to its own taste with sounds, whistling and self-made sound effects. Folklore or tea house paintings are parts of peoples' culture which contain the affection of people. This school has been established in tea houses, which is a meeting place for the poor and middle class, and has gradually become popular. It is not very clear when the first tea houses were established in Iran, but they certainly existed during the reign of Shah Abbas Safavid. In these tea houses, all classes, public and official people, and sometimes the king himself, would attend. In the field of tea house painting, the beliefs and boundaries of iconography as well as religion and traditions are the main forms of the image. On the other hand, the illustrated story is analyzed separately with the topics in terms of lack of spiritual thinking and only by the functions of two areas in recognizing visual relationship for the audience and the society. This study performed a comparative study method by collecting information through library.

Keywords: Tea House Painting; Comics, Comic Strips; Audio Effects

1. Introduction

Man's interest in the artistic production of illustrated stories led to the creation of illustrated chronicles in the early days of human civilization. The Greek, Iranian, Roman, and Egyptian

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carvings to record some of the war scenes, capture the soldiers, and bring them to the court of the kings are a kind of sequential visual narrative. The date at which the comic strip started is as old as the start of the caricature. Unfortunately, no stamp has been published with comic and humorous designs in our country. However, in 1977, on the occasion of Children's Week, some works by children's book illustrators and a number of children's imaginative paintings were published. Thus, humorous and comic designs are lacking among a mass of published Iranian stamps which appears to be quite tangible.

Comic book is a type of printed storytelling that tells stories by combining word-images. The art in the Qajar era, has escaped the attention of historians and thinkers in most cases, especially tea house painting, and not received much attention until recently. In this research, through a social and cultural approach, attempts are made to compare the visual designs of comic strips signs with tea house painting. The reason for choosing this subject is to investigate the social, cultural, artistic approaches and to measure the impact of these paintings on thoughts and the community's behavior. In fact, the main problem of the research is that the tea house-style comic and painting design enjoys unique features in terms of form, so the researcher aims to use the mentioned forms in today's comic strip construction.

Sequential (strip) caricatures in newspapers compared to other graphic stories have the same relations as the best-selling novels to detective novels. The utmost success of this type of caricature is due to its popularity and the contents used in it.

Sequential caricatures are the result of the joint efforts by the cartoonists who create them, the groups that distribute them, and the newspapers that buy, print, and publish. Each of which needs the other, and the interests of all of them hinge on the continuation of a work with high quality in order to attract more and more readers. There is almost always a definite boundary between business and art, but today in the field of sequential caricatures, the commercial aspect of the subject has overshadowed its quality aspect (Yaghoubi, 2011: 3).

Various research has been carried out in the case of painting in a fantasy style and comic books, which their content and objectives are expressed in brief: Techniques on making images and creating attractiveness in comic have been addressed in the work by George Remy (Hergé) stories such as (Tintin and Milo) translated by Mohammad Ali Sepehr Afghan in 2011; (Illustration) authored by Farshid Mesghali in 2014, in which the author examines the types of illustrations and compares them in this book, concluding that they should guide illustrators and students in order to get acquainted with different audiences; (Comic Art 1) written by Scott McCloud and translated by Ramin Rahimi in 2015 where the author addresses the importance and method of implementation; (Comic Strip Analytical History) translated and compiled by Mehdi Torabi Mehrabani in 2009; (Iranian paintings from past to date) written by Rooein Pakbaz in 2011; (Painting in Tea House) written by Hossein Mir Mostafavi; a selected woks of Ahmad Khalili and Professor Mohammad Farahani in 2008; an article entitled (Painting and Painters in the Qajar era) by Reza Afhami, Ali Akbar Sharifi Mehrjardi in 2010, as well as an archive of manuscripts, Mehr book of the month, review of Qajar painting from three perspectives and that the reader can collect and understand the Qajar style. The production of comic strips in our country is very limited. The main objective of this study was to identify, review and implement comic strip design and tea house painting.

2. Theoretical Foundation of Research

2.1. Comic Strip

Nowadays, reading a sequential comic story with an impressive number of eye movements is done to get across images and content, and since these images require the participation by readers, its designers act in such a way to help the audience to communicate more easily with the images on a regularly structural and graphical system. At the same time, some artists utilize a kind of cinematic approach to present their designs, and are inspired by cinematic views when presenting the shape and composition of the interludes, as they add to the attractiveness of the designs by using different angles, such as camera angles. Comic strips are a part of history, momentary memories and without the extensive burden of semantics that cause the reader's or viewer's imagination to go through in the desired directions. This is an art that, by making sounds, whistling and making sound effects, highlights the story and executes it according to its taste. The comics were founded on humor at the beginning of their arrival in the United States and in the United Kingdom. After a while, all kinds of adventures came forward and gradually including different themes, with different genres finding their way into comic book (Richardson, 1994). Today, comics are accepted in the West as an art form in parallel with novels, films and TVs. On the other hand, in Iran, some researchers, relying on the history of book illustration in Iran, consider examples of old books' illustration as the starting point and comic boom in Iran (Ziaei, 2004: 56). But regardless of such perceptions, the first comic examples appeared at the same time as the Constitutional Revolution and the dissemination of the press in Iran (Eghbali, 2010). The first comic strips in Iran were generally humorous and released for children and their special publications. With the passage of time and access to American comics, translating adventure genres began to take shape in children's and adolescents' magazines, and following their success, efforts by Iranian artists were made to create new Iranian comics, and also children comic as its audience were initially addressed. It was also welcomed by adult audiences and led to the formation of a few other genres (Ghaeini and Mohammadi, 2002; Tarhandeh, 2011).

2.2. Art and Painting in the Qajar Era

The Qajar era is one of the most amazing periods of the life for the Iranian art, especially in the field of painting. This era was named by artists as the era of Westernization. The works left from this era bestowed a new existence to the Iranian art in terms of performance style and understanding of the concept of aesthetics.

Qajar's art and artist also had a lot of conflict in the meantime. He was no longer able to return to his golden age due to the declining trend of the visual arts pertaining to the Zandieh era in a society close to industrialization, with all the attachments he had to the valuable versions of previous era. Thus, with a combination of European art and pure Iranian painting as well as the Zandieh tradition, a new visual arts stye emerged that first became Zand and Qajar art and then, in the middle of the 13th century, it became a Qajar art" (Javid, 2009: 7).

In fact, Qajar-era painting dates back to the time of Fath Ali Shah. Fath Ali Shah (1212-1248 AH) gathered some of the most prominent artists in the capital (Tehran) and appointed them to paint large-sized curtains to be installed on newly-constructed palaces. In fact, all the efforts made in court painting were to revive the glory of the Achaemenid, Sassanid and Safavid eras (Pakbaz, 2005: 114). Painting in this era becomes a success with a wide and comprehensive use of the tradition of centuries-old paintings and mixing of the traditional field of European landscaping with

symmetrical and uniform assembly and the consciousness of brilliant Iranian color painting and the addition of a rich decorative factor as well as the creation of a new style in Iranian painting; this is a method with rules, standards, logic, and principles that is completely new, alive, and original (Aghdashloo, 1992: 41). The presence of artistic thought indicates the way of thinking, aesthetic vision and dynamic attitude of Qajar era's painters. In this approach, non-senssual fantasy encounters visualization and human illustration versus divine encounter. It was in such a way that the art of the Qajar era was set out for humanism (Jalali Jafari, 2003: 22-23).

The first point to see in the study of Qajar's painting is the multiplicity of paint and oil curtains in relatively large sizes. The use of paint and oil was not prevalent in ancient Iran, and was first reported among European painters in the Safavid era in the 11th century, but it may have lasted about a century for this method to become popular among Iranian painters, with other methods of painting becoming more common little by little. In Qajar's art, paint and oil painting, so-called zir laki painting and enamel work were the most common types of painting. If one wants to choose the most exquisite Qajar paintings, one has to mention the images of the king and to pay attention to several pictures of Fath Ali Shah in the form of oil and paint curtains or enamel works on dishes. Fath Ali Shah encouraged the artists, and some of the best surviving examples of Qajar's art can be seen during his long reign. An example of this is the image of the princes and the officials painted by Qajar's painters. Another type of Qajar's painting, especially in the early part of this era, is the curtains that depict scenes of famous Iranian stories, and in fact they are closely related to miniature paintings depicting exquisite linear books. Curtains such as "Shirin swimming in the spring" and the stories of Yusuf, Zuleykha, etc., are famous stories that were depicted many times during the Qajar's era, but the early painters of the Qajar period did not have much skill in landscaping.

2.3. Tea House Painting

Tea house or folk painting is a branch of the pure and freestanding culture of people and has the purity of a pure heart. The art school was based in tea houses, a community of the poor and middle class, and slowly gained popularity.

One of the most important and clear motives for the emergence of epic and religious roles was the increasing popularity of narration and Shahnameh-reading and the warm and captivating words of the narrators in the tea houses in the capital. Some of these narrators did miraculous narrations in creating an atmosphere of heroism and interpreting Ferdowsi's moral advice. The painters valued the tea houses more than the narrators did. It didn't take long for the tea houses' walls to be covered with battle, banquet and religious signs. That's why tea house owners were the first to order tea house signs. Among tea house painters, Hossein Ghollar Aghasi and Modabar were among the forerunners of this art who had learned designing painting impressions on tiles and painting on garments and walls at the Tile-making and Designing Workshop by Alireza, thus joining their traditionalist painters.

Fig 1 Yousef and Zuleikha court, oil paint on canvas, Hossein Ghollar Aghasi cultivar. (Source: Seif, 1990)

In terms of subject matter, a number of curtains are included in the epic group and show the heroic stories in the Shahnameh, and a larger number of those curtains belonging to religious themes are dedicated to the tragic events of Karbala.

Fig 2 Kaykhosrow's move to Iran with his mother, oil paint on canvas, Hossein Ghollar Aghasi's figure, Haj Hossein Arab's order, Reza Abbasi Museum (Source: Seif, 1990)

In tea house painting, miniature themes can also be found, and arguably there can be found a connection between Persian poetry and prosaic stories. In the same quality, storytelling reached its peak in tea houses, received help from poetry and sometimes with a tea house finding a miniature grandeur.

Fig 3 Kikaus's revenge on Siavash, oil paint on canvas, Hossein Gholler Aghasi's figure, Reza Abbasi Museum (Source: Seif, 1990)

The most prevalent and distinctive feature of tea house painting is face construction (painting), where the pictures, along with the flourishing mystical and theosophical aspects, show hair-sprayed dervishes, while holding halberd in the armpits and Kashkool (cup) at hand, with some of the paintings representing ancient sultans and nobles.

Tea house paintings and the interesting curtains created by the artists in the Bazaar and maybe anonymous folks in this field are the full picture of the taste and thought as well as tthe art of its creators. These curtains, which suggest our traditions, beliefs and customs, are now a spectacular phenomenon in the traditional art of Iran, and therefore, for the preservation of these works of art that represent the beliefs and culture of the people, there are people who tried to collect such them. Tea house painting, first of all, tells of a story of the painter's world, as this type of painting knows no rules, and never does any of its examples prove to be a definite judgment about another example.

In regard of tea house work, first of all, the work style and the goal of the painter as well as the preservation of tradition are raised. And this can only be achieved through experience and observation. For example, one wants to write about the bazaar, but the author no longer uses his memories alone, but goes to the bazaar and sees it and explains the story. Thus, what a painter does in a tea house who spends a lot of nights there talking to the narrator is very different from the painter who sits in a well-equipped workshop and only creates a picture with the help of his mental perception.

In tea house painting, composition/arrangement and colors are ideal. Painters of this style work based on the imaginary nature of the images, because they are more about showing goodness and evil and that moral themes are taken into account. The size of the images is related to the role played by characters in the story. The major points or characters are placed in the center of the canvas, and smaller people are placed in the margins. According to this, the viewer is fully informed about the story. In coloring, the same method of composition/arrangement exists wherein people and painters enjoy green stable colors as colors are not used for entertainment, but each color has respect and dignity for itself (Hossein Mir Mostafa, 2008: 29).

3. Research Method

The present research is of descriptive-analytical type, the method of data collection and statistical population of the present study include visual artists and the remaining works are from narrative curtains and tea house paintings and comic books. Tea house paintings and comic illustrations as well as books and resources are available for the designs.

According to the dissertation subject, sampling method is based on the design of narrative curtains in a tea house painting and comic strip style. Works are available. Tools for collecting data were library access information to credible sources and collecting field-based and interviewed samples.

The method of analyzing was qualitative and technical information analysis.

3.1. Creation of a Comic Strip

The one who is interested in this important way of illustration, i.e., comic strip, should have an organized way to collect everything deemed necessary to know in order to develop into a complete creator of a story. To design an illustrated story, the designer requires being familiar with the information of literary expression and knows the composition within a theme, its synthesis, and the concept of graphic continuity of the story. So it's not enough for one to just design well with a brush or a pen, rather one has to be able to express a theme graphically. An illustrated story also has a

graphic aspect that changes according to the subject. Each subject requires a specific type of artistic expression, and to design an illustrated story, one must use all his/her design knowledge: perspective, color evaluation, framing, composition/arrangement, and so on.

A creative person should consider the following issues when implementing his/her plans: Complete knowledge of typology, state expression, movements, cutting, results from a work space, and continuity.

It is very easy to find and pay attention to all the issues raised while reflecting on the performances of the primary creators of the illustrated story. Even themes-playing, which is commonly referred to as suspense in cinematography, is arranged in such a way that each band should in itself be a small sample of the whole work. It is clear that presentation of this form of the illustrated story is related to its subject, or more precisely, to its scenario; that is, the presentation of a small part of the work that shows the foundation of a story. Today, as seen in most cases, the creator of an illustrated story only plans and divides the images related to the scenario, while s/he has to be exclusively engaged in the graphic part of the illustrated story. It is useless to say that the illustrator of an illustrated story must be a good designer. To claim to be a creator of an illustrated story without knowing all the possibilities of designing with a pencil and finishing it with a pen or a brush is like someone wanting to start building a house from the ceiling. Therefore, these questions must be asked.

3.2. Creation of Characters

The first rule for a good illustrator to always keep in mind is to design simple forms without much searching for features in a natural way and always tailored to the first effects. An illustrated story is nothing but a commercialization of illustration, so it is necessary to consider an issue called production; i.e., the production of the largest number of images in the shortest possible time. In this way, everything will be possible with simplicity and speed, and the designer's imagination will become a mental archive of a large number of images over time. It is not possible for a designer to create a mental role without having seen something like it before. Gathering ideas and frequent observation improves the designer's ability, while natural drawing always helps the designer impressively. To design the characters in an illustrated story, one must utilize the product of the special natural state one has achieved in the design. Because the main forms in practice will be repeated many times, and there is a likelihood that if one is not careful enough, s/he will slowly change them. So, one has to keep their uniformity, and this uniformity of character plays an important role throughout the illustrated story.

3.3. Framing Illustrated Story

Illustrated stories are like a movie in which the content is described and expanded through a series of images. In an illustrated story, this continuity seems to be interrupted, but it clearly retains all that is necessary for a basic understanding of the theme. This method is related with combinations and simplifications that remove unnecessary movements and speech, as well deals with the analysis of a problem arisen over time. In an illustrated story, the theme is explained in two ways:
A. Through speech
B. Through image

What the movement itself cannot express is expressed in words, but the image helps to place the story in an appropriate setting. This is exactly what is being done in cinema. The scenario is a problem that is resolved and reconciled with a very close connection of words and images.

3.4. Scenario

In a simple design, one can pay attention to the states that are critical so that the illustrated story enjoys an appropriate support and the reader is attracted to see and read it. From now on, one can visualize the issues more graphically. As a result, our simple design will rely on illustrated story designs.

The screenwriter prepares his/her scenario by following the rules of a real cinematic scenario. That is, s/he numbers the designs, writes the pictures, plans them, and presents them in detail. By determining the views, he sets the general plan, places the characters in relation to a certain point of view, and so forth.

In short, instead of a painter, the screenwriter imagines the subject in such a way that the painter's work is nothing but to draw according to the description set in the screenplay. When the painter takes over the script, s/he can start his/her work, which is based on giving a graphic shape to the illustrated story.

3.5. Sound Design in Comic Strip

Another element of illustrated story design is to illustrate sounds, such as explosions, objects colliding, gunfire sounds, etc. All these sounds can be applied along the text to represent the semantics of the story as much as possible, and to design them from the graphic design of the fonts to fit the situation and to add to the charm of the story.

3.6. Applying Image and Dialogue Description

Using image and dialogue description in manga is followed by a significant percentage less than Western style indicating that communication with the audience in the manga style is done more by image than writing. So, the audience can receive the message more easily and quickly. Of course, the image language is the international language that is understood by everyone. So, obviously, an audience that is not familiar with the desired language will also benefits the content of the story to some extent, and this alone is a great privilege for this method. While in Western style, writing plays a significant role alongside the image.

3.7. Applying Phonetics and Letters Design

Use of phonetics and letter design is more common in light manga comics, and this is because in manga, due to the lack of writing, phonetics and design of letters is more important and includes part of emotional concepts and the mood of the story, which helps to express the story. However, in the Western style, the use of special letters and phonetics is less used due to the high volume of writing, unlike the manga method in which Bofur is found. Obviously, the work in which the design of more letters and phonetics is used frequently will be more attractive to the audience and lead to a closer communication.

Fig 4 Tintin and Milo. The technique of illustration and creation charm in comic (source: Sepehr Afghan, 2011)

Fig 5 Sonic Image (source: Mesghali Farshid, 2014)

3.8. Use of Different Views

There is not much difference in using these two views in these two methods, and the only obvious difference being the use of very far views and very close views, both of which are evident in the manga style. The reason for this is clear. In order to explain the story more accurately and use less writing, it is necessary to show an off and on general space so that the viewer becomes more familiar with the story setting and is given more time to see and know.

3.9. Use of Frames

When comparing frames in these two ways, one can understand that the frames in Western style originate from a logical style and based on the basics of forms, i.e., with regards to the sections of the image that are followed by a text, generally rectangular squares and sections wherein the story becomes action, frames will apply which are mixed with irregular shapes based on what the designer has chosen. However, in the manga style, there is more diversity in the use of frames, and it usually does not follow a framework and rules, and they also take shape based on the mentality of the frame's designer. So the manga designer designs much more freely and has no limits in this regard.

3.10. Use of Deformed Faces

Here, deformation represents exaggerated states and changes in facial expressions. The characters in the story alone can be shaped completely out of design. For example, they can be an imaginary creature, and what is meant by deformation is the secondary changes that happen in the designing the characters throughout the story. For example, what changes occur in the same characters as a result of punching or shouting, and the purpose of the measurement could be to measure the level of change. This situation is much less common in Western comic strips than in

the Japanese style. This denotes that Western-style images are much more realistic and logical, and deformation in them usually does not exceed the norm and is more in line with reality. However, in the manga style, deformation is much more intense.

Fig 6 Ismaili Sehi Morteza Literature and Languages Technical Features of Comic Strip Research Journal of Children and Adolescent Literature

The manga style has more tendencies to show emotion, especially exaggeration. For example, a state of fear is represented by an intense deformation of the face, in which the eyes are very large and circular, and the pupils of the eyes are depicted as a dot in the middle of it, and this is a feature to attract the audience's attention as much as possible. This could also yield humor in a manga.

3.11. Use of Different Facial Expressions

Facial expressions in light manga paintings have more diversity, balance, gentleness and freshness. However, there are more states of anger, screaming and shouting in the Western style than in any other mode, and because of this, the Western style appears to be more violent, harder, and inclement, and in comparison with the manga method, it evokes a more serious state. This is the exact opposite of the Japanese way of doing things.

Fig 7 Facial Expression

4. Comparative Study of Tea House Painting and Comic Strip

It appears the color theme of tea house painting and the type of composition of this style as well as the way characterization is made in tea house painting can be used well in comic strips.

4.1. Characterization in Tea House Painting

The way in which the characters in national and religious stories are portrayed also follows conventional signs, so that their identity can be understood from their visual form. For example, the image drawn from Rostam or Sohrab and their characterization follows contractual patterns; the patterns known to the audience due to their contractual nature, however, the same familiar characters are sometimes reconfigured with writing and their names are written in a corner. But the important point to note is that in most of these works, the existence of writing in the corner or bottom of the painting does not exceed the introduction of characters and places, and in some others they serve a short description of the general narrative, which later became the title of the work (Kheiri, 2008: 36).

Concerning the size of the image surface and its relationship with the hero, when looking at the paintings of Rostam and Sohrab, one can see that most of the space in the painting depicted by Rostam, this is the reason for the painter's interest in the hero's character (Nabavi, 1974: 66).

The painting style was an artistic tea house based on religious symbols and a kind of "primitivism" dominating society and popular traditions.

1. Attention to cultural, ethnic and religious originality
2. Avoiding the alien culture
3. Doing things as a group and avoiding individualism
4. Imagery and avoiding objective facts
5. Humility and lack of effort to gain fame
6. Showing beauty in the works and avoiding showing ugliness
7. Using limited oil paints with symbolic meanings
8. Using Islamic motifs
9. Magnifying images and shapes that have been the main subject of the text
10. Matching form and meaning, and thematic and content communication
11. Using all the tableau's space
12. Focusing on the elements that make up the work around a center or central core of the work
13. Resentment of empty space and therefore, filling the work's space with dense elements of the composition
14. Orientation for particles, which means that the composition of each element is composed of very fine and harmonious elements and is homogeneous and harmonious with the elements that fill the empty spaces.
15. An induction of height of the space and the depth of the space by showing the elements of the face-to-face composition, top and sides of the composition at the same time (Taghavi, 2015: 17-18).
16. One of the features of this type of painting is that it lacks a model. In a tea house painting, the faces are basically beautiful, because the painting must be beautiful. The faces of the characters, positive or negative, are both beautiful. But the positive faces are drawn beautiful characters (Khavari, 2008: 19).

5. Analyzing Comic Genres by Design

It seems that the classification of the genre in Western comics is based on the content of the narratives. The genre is a means for studying and better understanding the narrative in different media. Many of the known genres in cinema and literature have the same characteristics. But few genres were born out of comics and found their way into other media, e.g., the superhero genre that started with Super Man and comic books.

Despite the remarkable diversity of the Western comics related genres, in a general perspective so far, comics in Iran have often been created in four major genres, including religious genre, epic genre, war genre, and folk genre.

At a glance, one can find similarities and differences between the Iranian and Western genres. On the other hand, due to the small number of Iranian comic genres compared to Western genres, it is possible to find equivalent types for some Western genres among Iranian genres, both in terms of subject matter and content characteristics. According to the table of genre contracts (Table 1), despite the different characteristics between the two species (Western and Iranian), one can find common components, despite dissimilitude.

From a general point of view, it seems that among the Western genres, the genre for which one can find an alternative with the maximum possible thematic similarities among the Iranian genres is the war genre.

Table 1 Component of Iranian and American Comic Genres and Iranian Epic Comic Genres and American Super Heroism

Components	Iranian war genre	American war genre	Epic	Super heroism
Time	1980 to 1988	1914-1945	Ancient time	The present
Place	The country's border areas	Country	Iran	The world
Male hero	Fighter	Soldier	Pahlavan (hero)	Superman
Female hero	Nurse	Young woman	Female hero	Super woman
Anti-heroes	Iraqi soldier	Enemy	Non-Iranian	Super disturbing
Scheme	Repelling the enemy	Repelling the enemy	Repelling the enemy	Repelling the enemy
Theme	Defending the country	Defending the country	From justice to openness	Saving the world
Clothing	Military uniform	Military uniform	Armor	Cape
Vehicle	Car	Tank	Horse	Supercar
Weapon	Mortars and guns	Mortars and guns	Archery	Supernatural forces

Table 2 A Comparative Study of Tea House Visual Drawings with Sequential illustrated Story

Characteristics	Tea house painting	Sequential illustrated story (comic)
Figures	- Dry and formal figures - Army ranks are usually drawn in one position -Contractual method	- Drawing statues with different modes
Faces	- Similarity in faces - They are clearly marked on the screen; they are either in the center of the screen or larger	- Diversified faces
Protagonist		-They are marked in the picture
Emotional facial	- Faces without emotional states - Drawing heroes with determined faces and	- Faces have emotional states - Draw a superhero with a variety of

expressions	without a state, especially that of Rostam	facial expressions
Vehicle	- Drawing a horse is more like a half face. - In these pictures, Rakhsh is drawn with firmness and strength.	- A variety of modern vehicles are drawn.
Other animals	- They are really designed, but they are defeated by the greatness of the heroes. - They do not have a specific position.	- Absolutely good design in real and virtual animal design
Legendary creatures	-Their mythical state is greater, and these creatures are a combination of all beings in the material world.	-They are closer to real beings
The sky	- Drawn in the last plan. - Usually blue and cloudy. - It is separated from the ground by mountains or human buildings or groups of troops	- Use different colors in the sky (sometimes depending on the text of the story.)
Color	- Use a variety of colors; sometimes happy and bright and sometimes dark and opaque - Less transparency due to the use of paint and oil - Round styling to separate the positive from the negative	- Use a variety of colors - More coloring with computer software - Round coloring to separate positive and negative space
Architectural elements	-Trying to use the geometry of landscapes in drawing architectural buildings.	- Using the geometry of landscapes and objects in drawing architectural buildings. Real and virtual geometric features and shapes
The light	- Divide the light evenly throughout the image - Existence of bright shadows in the background and negative image space.	- Changing the source and creating a light shade
Composition	- Has a relative balance and symmetry	- Has a normal and unusual balance depending on place and time
Decorative element	- They have a lot of decorations on the clothes of the main characters- The decorative element is balanced everywhere in the image	- The decorative element is rarely seen
Writing	- The names of the main characters are written.- In some scenes, verses from the poem are related to the text.- The subject, signature and date of the artist's work and sometimes the orders are listed on the curtains.	- The names of the main characters are written - Usually placed without a box or inside a rectangular box - Writing in bold and black means to be important - capital letters mean shouting - The lowercase letter means whispering
In the picture	- The far view is drawn smaller than the close view. - There is no perspective	- Perspective (there is depth and dimension - Select the correct angle - Angle plus angle (eliminates flatness) - Convergent lines (convergent mode)
Perspective	- It is symbolically depicted	- It is very important and in most of them the place is recognizable.
Space	- Landscapes and natural landscapes have been used extensively to fill in the gaps in the image	- Natural spaces are used according to the text of the story and its coordination
Nature	- The images are expressed by the narrator.	- Narrated by sound effects - Balloons and word inducers

6. Conclusion

Comics have always enjoyed a set of typical patterns in design that have reached its peak in the Manga School. In the manga, there are many design patterns and identical elements that it is practically impossible to have a personal illustration style. In fact, the type of audience, the speed of storytelling, the high circulation of titles and copies, and the small gap between successive stories have made comics more of an industry than an art. Of course, it is obvious that the presence of personal styles of artists in the comic genre is not rejected, but in contrast to the mass and industrial production of comic books, it is very limited. This method can be reconstructed anywhere in the world, including Iran. That is, imaging teams have been set up to produce comics. Although the main barrier to forming such teams is the general weakness of design and technique, the main barrier is the lack of social and cultural opportunities. This denotes that comics face many barriers, both in terms of the text and the power of writing, in terms of the presence of capable illustrators relevant to this method, and in terms of socio-cultural contexts. The illustration of story books is related to imagination, and this is different from the imagination that we need with comic strip illustration. The comic strip illustrator goes to the cinema, but the story book illustration does not. There are points in the illustration of the storybook, and the audience has to go the rest of the way, but comic strip images benefit from the kind of interconnectedness and illusion of movement.

Two approaches can be followed in the field of tea house painting and comic book illustrations. One is the similarity and closeness of the narrative of the story and their goals, and the other is the differences related to the cultural and social issues of each field. In the field of tea house painting, iconography and religious beliefs and values are the main constructive elements of images, and on the other hand, the illustrated story with the themes of this world in terms of spiritual thinking and only with updated and materialistic functions in the form of "realistic" stories star to produce. In both cases, the narration of the story and drawing the attention of the audience are considered a general procedure and its key is to recreate a story to explain the subject and the story according to a specific goal. But the difference is in facing the image and the type of narration being the most important differences between the two fields. The forms of sculptures and spaces, the use of writing, the use of facades and different angles of view, and the use of several events in one image are common to both fields. But it is significant to note that some of these features and specifications differ in their usage and type of use, which cannot be ignored.

From the narrow boundaries of differences in both the field of fiction painting and sequential comic illustrated stories, one can find out that fictional painters have always taken into account the viewer's mind and awareness of the subject and narrative. In other words, the audience has always played a key role in completing the key narrative. On the other hand, this has kept the author and the audience away from the holy thing. But in comics, everything is always displayed in the fullest detail. Therefore, the audience can identify with the characters in the story. For this reason, even right now, visual works of most illustrated stories have great detail in the design of sculptures and the creation of space and bring it closer to the external reality.

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