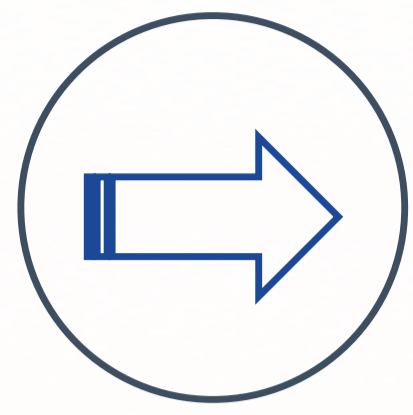




Perception Of Smile Aesthetics Among Greek Dental Students

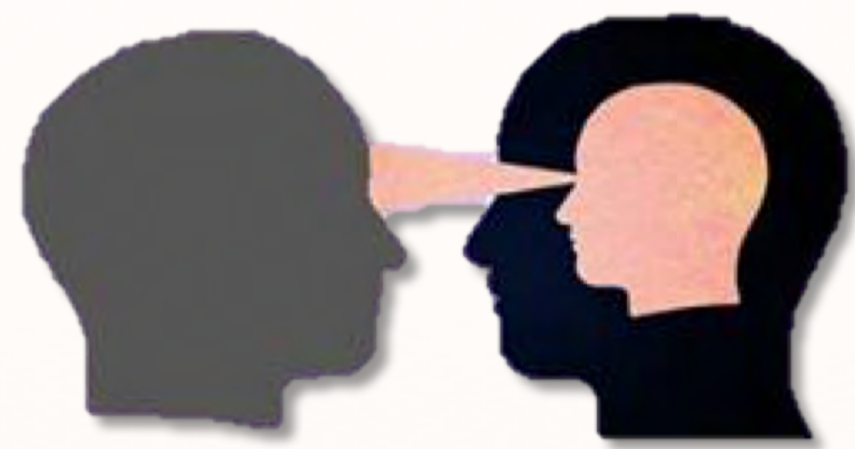
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Poster ID
159



Introduction

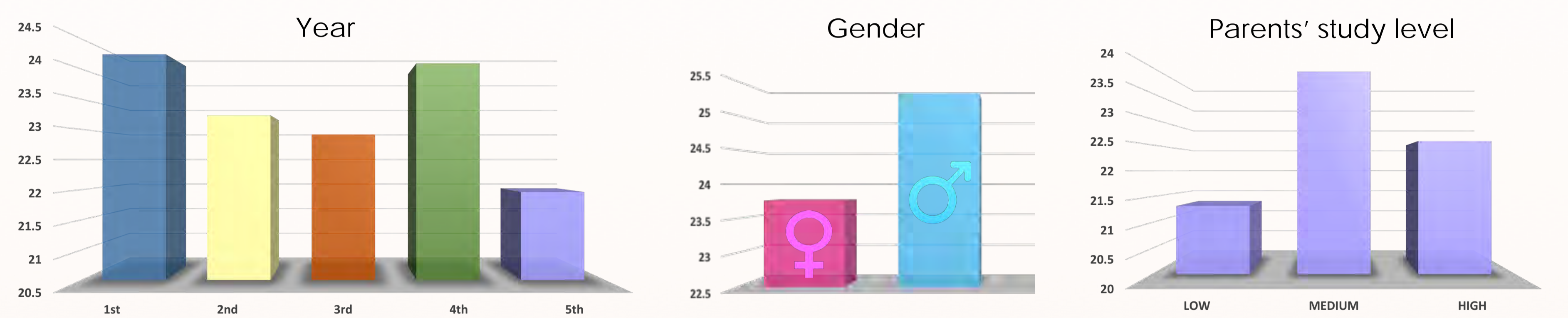
Individuals whose faces are characterized as more attractive, have been associated with higher success in their interpersonal relations and quality of life. Facial aesthetics are inextricably linked with the smile, which, during social interactions, is the most frequently visually visited spot after the eyes. Many people desire to improve their appearance through making changes in their smile. The influence of smile discrepancies, when perceivable by third party observers, in the self-esteem, the development of personality and social contacts, should not be ignored. The perception of smile aesthetics varies from person to person. Often, patients' expectations, are not consistent with the rules and the protocols which dentists has been taught. Perception is one of the cognitive functions, which people use to organize, identify and interpret sensory information, in order to transform sensory input to higher level information and understand the environment. In dental science, the quantification of smile perception is essential to provide scientific data to guide diagnosis and treatment planning, in line with patient's needs and perceptions. Studies based on smile perception, seeking to assess the aesthetic impact of smile discrepancies, seem to constitute a more objective and evidence-based manner through which many aesthetic dentistry rules are reassessed. The evaluation of modified digital images, is one of the most prevalent methods, which are used to quantify and capture smile perception. Smile discrepancies are more perceivable, by dentists compared to non-professionals. As for perception of smile discrepancies in dental students, literature is limited. The objective of the study is to assess the perception of smile aesthetics among Greek dental students in accordance with their academic background.



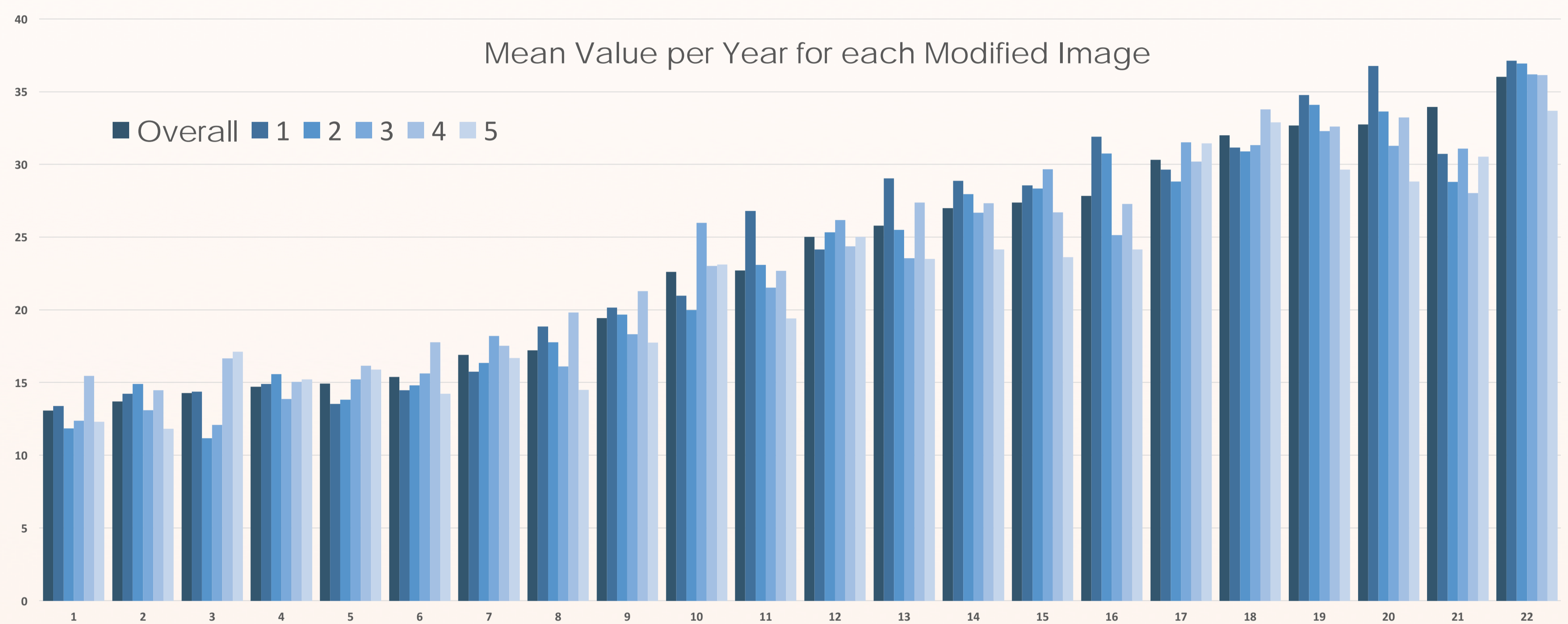
Results

Students in the last year of studies found the smiles overall less attractive, compared to students from all other years, with a statistical significant difference ($p < 0.05$). Male students assessed the smiles more attractive than female students did. Ideal smiles were identified by students of all years. Although some aesthetic alterations, such as tooth diastema, were identified by students from all years, other alterations (e.g., the discrepancy of the median line and increased gingival display) were primarily identified by students at the last years of their studies. Tooth coloring influenced a greater distribution of students in the first year.

Mean value per



Mean Value per Year for each Modified Image



- 1. Midline Diastema + Gummy Smile + Reduced Lightness
- 2. Midline Diastema + Gummy Smile
- 3. Sever fluorosis
- 4. Midline Diastema + Gummy Smile + Canine Recession
- 5. Midline Diastema + Reduced lightness
- 6. Multiple Diastema
- 7. Midline Diastema
- 8. Incisal crowding + Peg Laterals
- 9. Incisal Crowding
- 10. Reduced Lightness (Intense)
- 11. Gummy smile + Recession
- 12. Multiple black triangles
- 13. Reduced Incisor Length
- 14. Unaltered canines in place of laterals + Increased Central Incisors Length
- 15. Midline Deviation
- 16. Gummy smile
- 17. Reduced lightness (Soft)
- 18. Reduced tooth display
- 19. Central Incisor reduced width
- 20. Central Incisor reduced length
- 21. Peg laterals
- 22. Sound canines in place of laterals



Materials & Methods

400 undergraduate students, 80 per year, from the 5-year study program,



of the University of Athens Dental School, Greece were randomly selected to participate in this study.

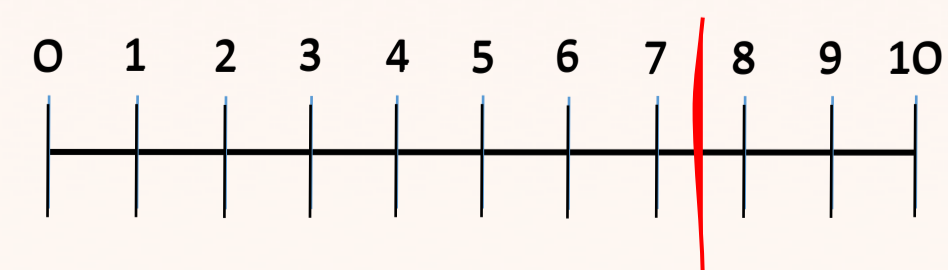
An interview in person with all students was arranged for the completion of the questionnaire.

The survey, aside from questions to characterize the sample individually, included 22 photos of frontal smile with variability in smile components. The 22 different frontal smile images were produced through modification with Adobe Photoshop (CS6).



Questionnaire ID :
1. Age:
2. Gender: Male Female
3. What region of the Greece do you live in?
4. Where are you from? Greece Other
5. Which is the highest level of your parents' studies (even if they have not finished it)
 Elementary school Junior high school
 Technical school Senior high school
 College / University Bachelor
 Master Doctorate

Attractiveness of each smile was assessed using a Visual Analog Scale (VAS) for each image.



Discussion

Students' ability to perceive alterations in smile aesthetics did not improve linearly over the years of their studies. Students in the last year of their studies, perceived smile discrepancies with greater ease, indicating that visual aesthetic skill is mostly gained during clinical practice. Academic background seems not to impact significantly the classification of smiles. A strength of the present study was that the images included smiles which has been modified to present smiles with not only one but with more aesthetic discrepancies, as the aim of the study was not to determine the precise size in which a discrepancy becomes perceivable. Dental schools have to reinforce their program regarding smile aesthetics, in order to help students during their studies, to acquire the ability to determine smile alterations.



Conclusions

Perception of smile aesthetics seems to evolve during the students' dental studies but with no linear development. Clinical experience is the critical parameter that can affect the observation of smile aesthetic discrepancies. Dental education has to provide the appropriate background on the aesthetics of the smile, primarily during clinical practice, in order to help future dentists properly calibrate their smile perception.



References

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