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SOCIOMET, A POWERFUL SOCIOMETRIC TOOL

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GREI
Interuniversity Research Group on Peer Rejection in School Context

Relevance of peer relationships in the socio-cognitive development of children

SOCIOMET

Reliable and user-friend instruments are necessary to assess peer acceptance and rejection

Authors: Julio González Álvarez and Francisco-Juan García Bacete (2010)

Characteristics
- A software for conducting sociometric studies that yields a description of the features of the peer relationships of each student and the characteristics of the classroom group.
- Its application can be extended to any context in which the participation of members of a group is required.
- It provides
  - Useful knowledge about the social relationships from the perspective of the pupils.
  - Detailed sociometric characterization of each pupil and his/her sociometric type.
  - Understanding of the subgroups that exist in the classroom.
  - A measure of the social climate of the classroom.

Procedure of identification of sociometric type
(García Bacete, 2006; García Bacete & Cillessen, drafted manuscript)
Adaptation of the Newcomb and Bukowski's (1983) binomial procedure to three, five or unlimited nominations

PREFERRED $\quad$ PNR ≥ UL$_{PNR}$ and NNR < M_{NNR}
REJECTED $\quad$ NNR ≥ UL$_{NNR}$ and PNR < M_{PNR}
CONTROVERSIAL $\quad$ [PNR ≥ UL$_{PNR}$ and NNR ≥ M_{NNR}] or
$\qquad$ [NNR ≥ UL$_{NNR}$ $\quad$ and PNR ≥ M_{PNR}]
NEGLECTED $\quad$ PNR ≤ 1* and NNR < M_{NNR}
AVERAGE $\quad$ The remaining participants
*In case of five or unlimited nominations the value should be the largest value of LL$_{PNR}$ or 1

PNR = Positive nominations received
NNR = Negative nominations received
UL = Upper Limit $\qquad$ LL = Lower Limit $\qquad$ *M* = Mean

PROCEDURE

1.- APPLICATION OF THE QUESTIONNAIRE
1.- Who do you like most?
2 Who do you like least?
3.- Who do you think likes you?
4.- Who do you think does not like you?
Peer nominations can be limited to three, five or unlimited.
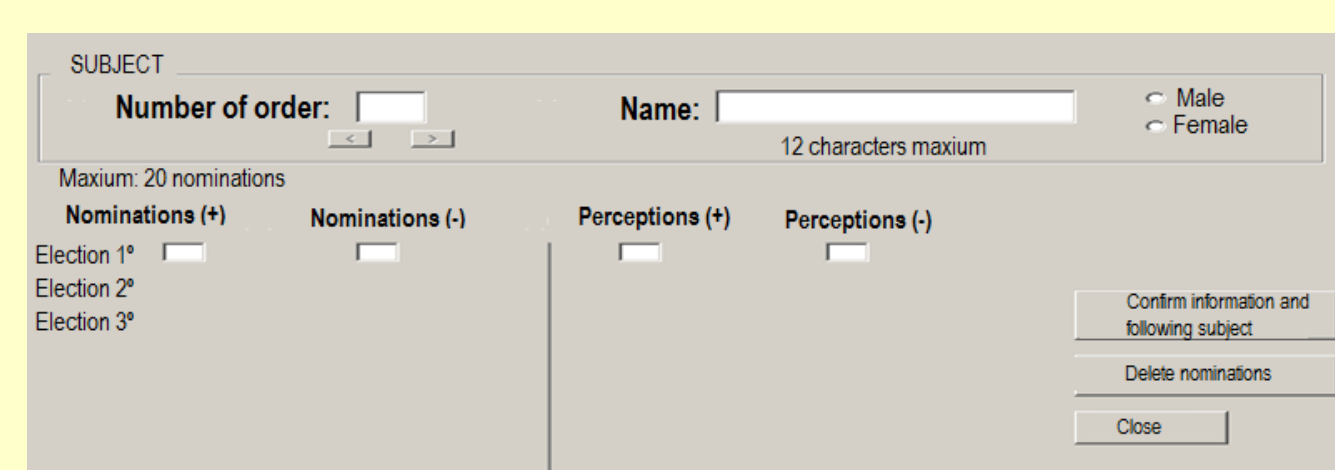
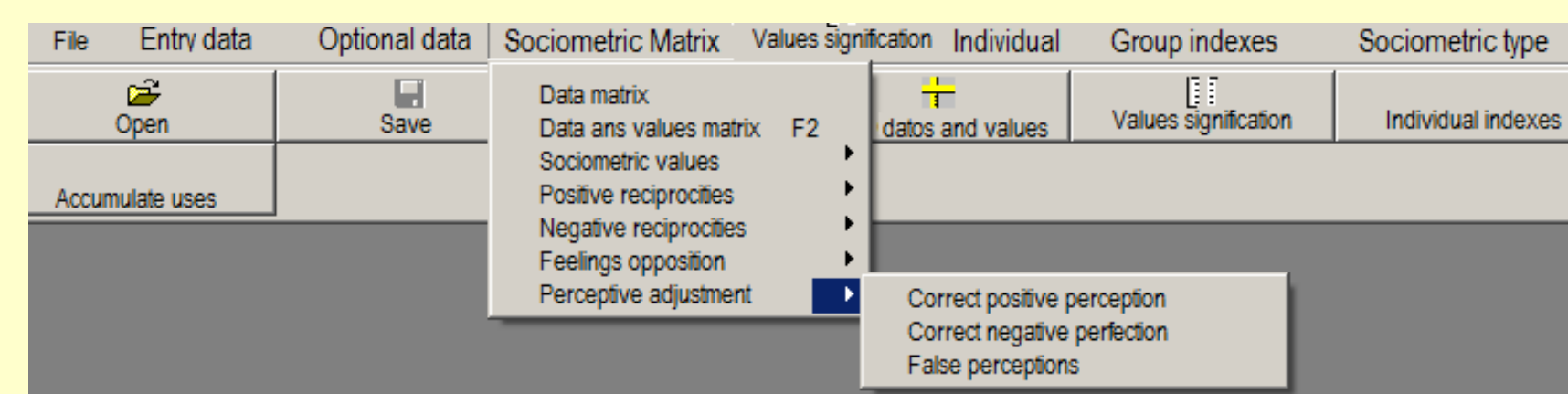### 2.- DATA INPUT

Figure 1. Display of data input

Figure 2. Taskbar of menus, buttons and submenus

The input is simple and rapid. The user can easily move from the data of a student to the immediately following student (figure 1).
By means of an extremely simple taskbar, Sociomet indicates sociometric types, significance of the values, individual and group indices and displays graphics of social networks and sociometric matrix (figures 2 and 3).
It offers the possibility of exporting the output to other programs (e.g., Word, Excel, SPSS).

Figure 3. Value matrix
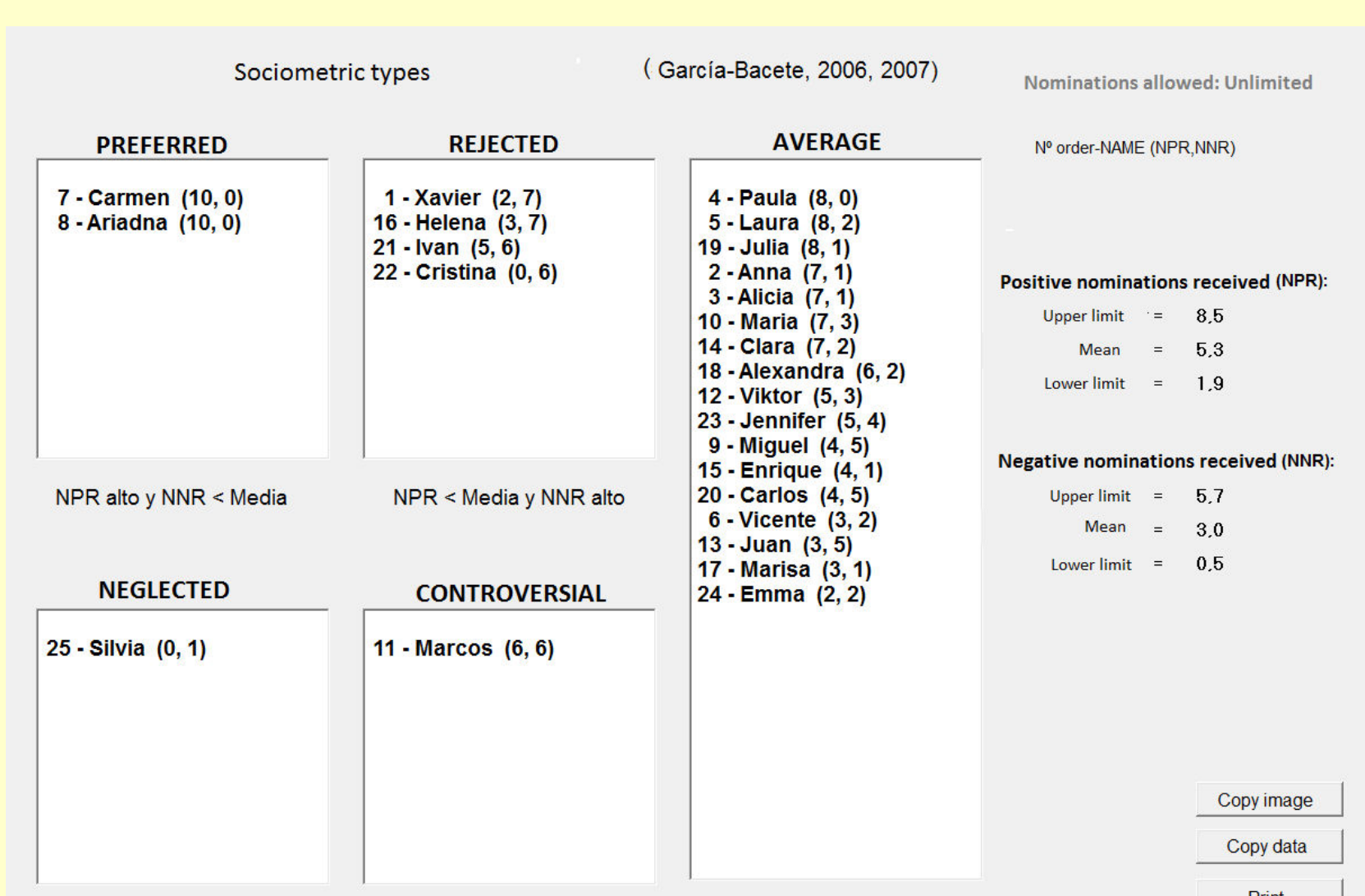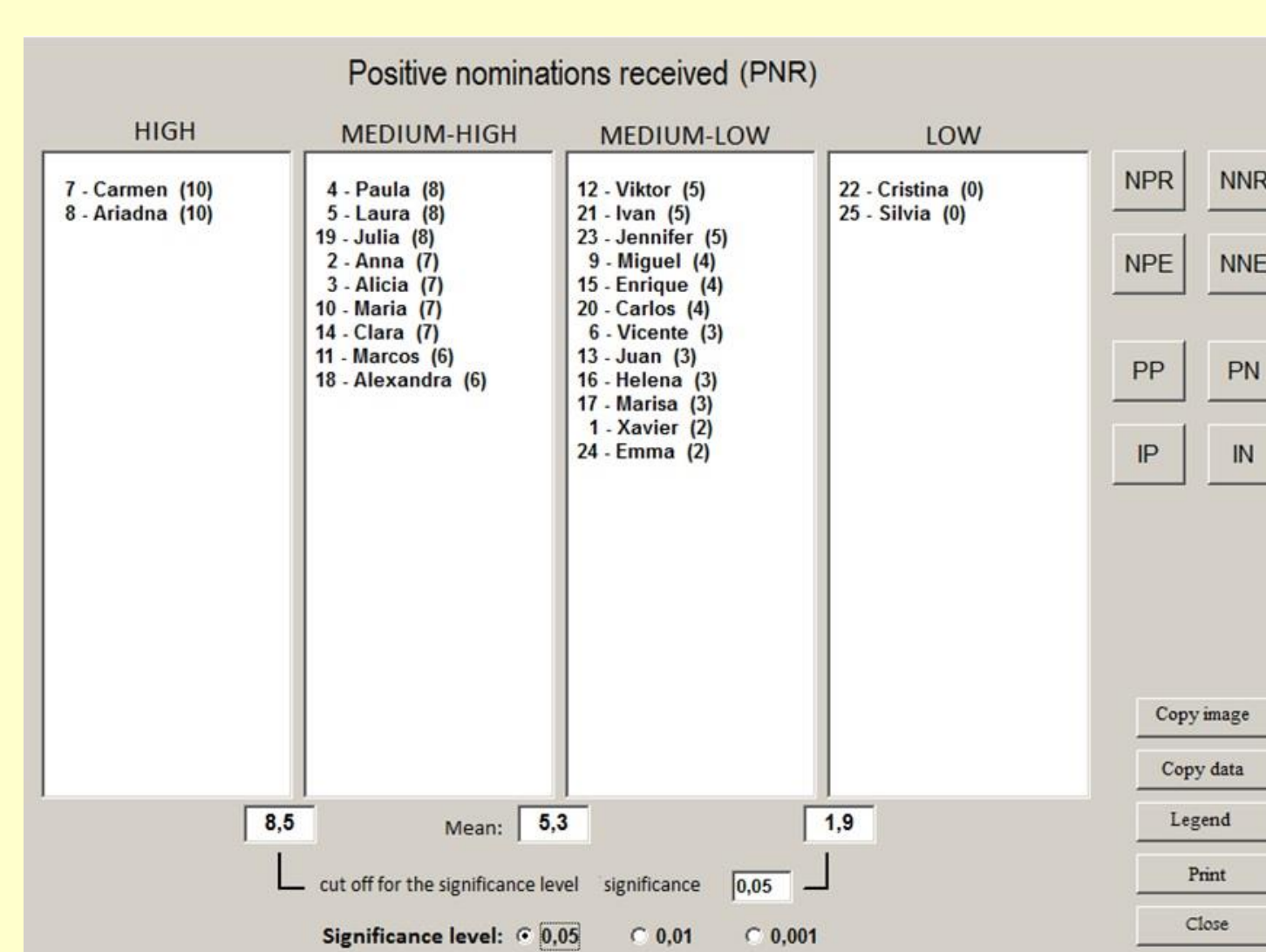
3.- DATA ANALYSIS

Figure 4: Sociometric types

Figure 5: Positive nominations received

Figure 6: Individual values and indices

Figure 7: Sociogram of first and second positive nominations
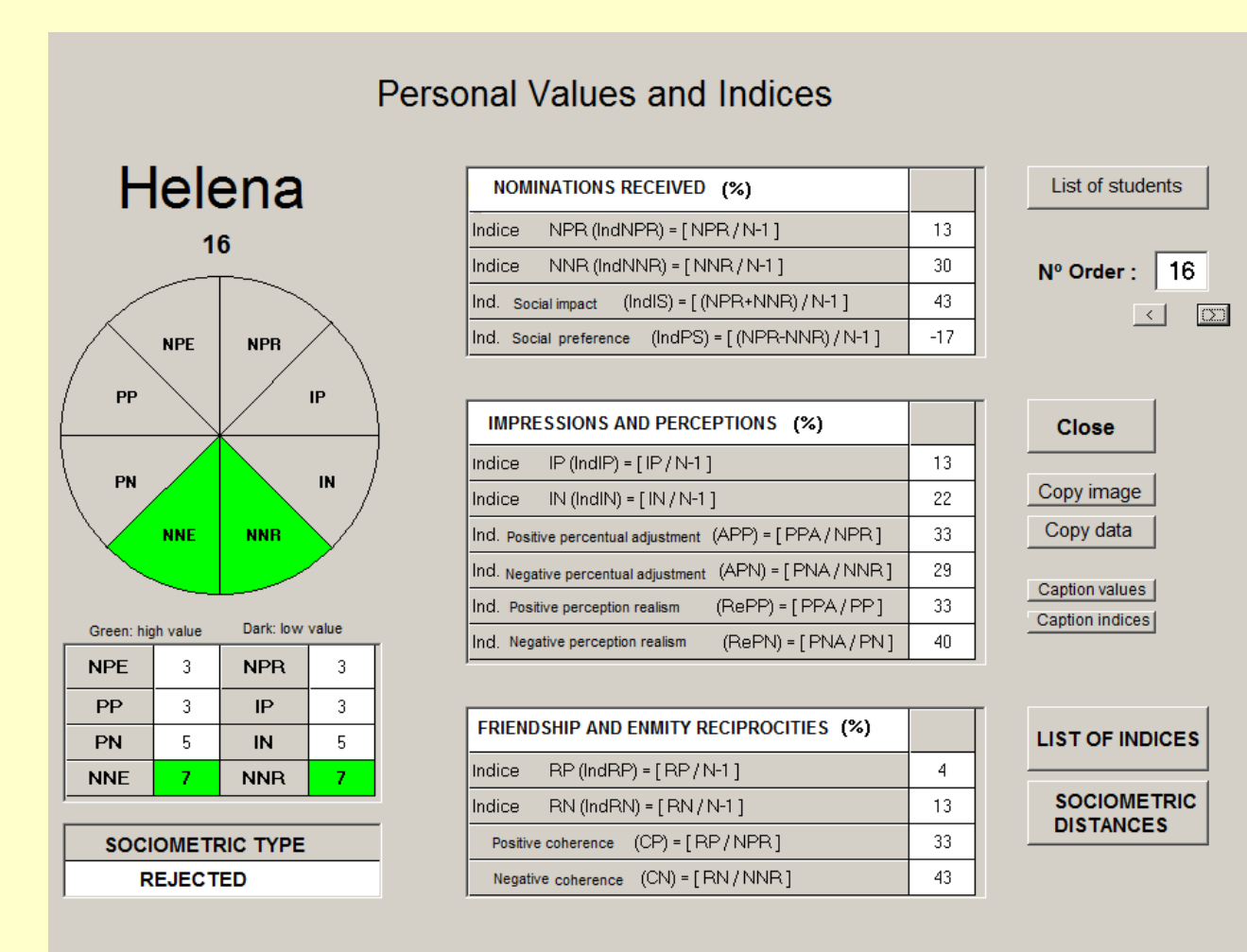
The figure 4 displays the sociometric type of each student (Preferred, Rejected, Average, Neglected and Controversial) and as an example of the situation of each pupil according the mean, upper limit and lower limit of nominations, figure 5 offers the distribution of PNR.
The figure 6 shows an example of individual values and indexes. On figure 7 is an example of sociogram of positive nominations. This and the other sociograms make the teacher aware of the sociometric characteristics of the pupils and the networks of friendships.

A user manual that explains all the possibilities provided by this powerful tool is available in Spanish (García Bacete & González, 2010).
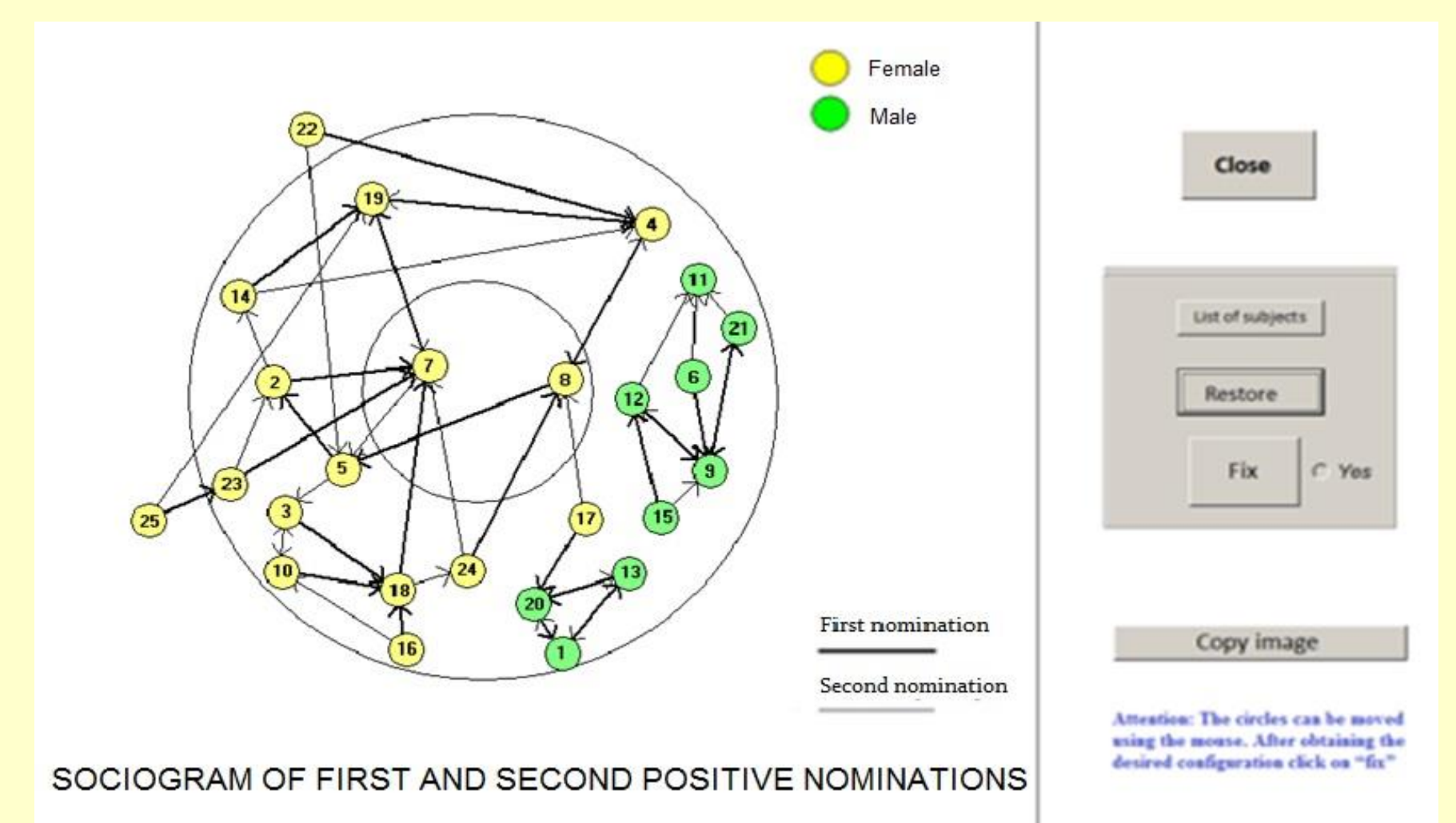
References

García Bacete, F.J. (2006). La identificación de los alumnos rechazados. Comparación de métodos sociométricos de nominaciones bidimensionales. *Infancia y aprendizaje, 29(4)*, 437-451
García Bacete, F.J. & Cillessen, A.H.N. (Drafted manuscript). *A comparasion of methods to identify classroom sociometric status in a Spanish simple*. Departamento de Psicología, Universitat Jaume I.
García Bacete, F. J. y González, J. (2010). *La evaluación de la competencia social entre iguales. La sociometría y otras medidas*. Madrid: TEA Ediciones.
González, J. y García- Bacete, F.J. (2010). *SOCIOMET. Programa para la realización de estudios sociométricos*. Madrid: TEA Ediciones.
Newcomb, A. F., & Bukowski, W. M. (1983). Social impact and social preference as determinants of children's peer group status. *Developmental Psychology, 19*, 856-867.