

## Identification of Emotional Components to Improve the Motivation for Science Among School Teachers

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Science education has been searching for new strategies to involve students in scientific investigation processes. These strategies should stimulate questioning, predicting results by means of experimentation as well as developing abilities for discussing results. They should also provide the students with the capacity of understanding how the scientific knowledge is continuously produced rather than transmitting scientific facts to them. Since 1985, the Instituto de Bioquímica Médica, UFRJ, has offered a science education program consisting in vacation courses directed to students and teachers of basic education. During the years, the program grew and spread through the country becoming a network involving 23 different research groups. In the courses, the participants develop practical activities and are encouraged to think about a biological topic, to raise questions about it and propose experiments to answer their questions. The course is coordinated by a staff and by graduated students that act as instructors, helping the participants to do the experiments idealized by them. In this work we investigated the factors that raise the interest and the motivation for science in the participants. For this, fieldwork and questionnaire analyses were performed. The questionnaires were filled up by the teachers in the beginning and in the end of the course, and the method of content analysis was used to read the answers. The results showed that the motivation for science was raised by a strong emotional component generated by different factors, as the interaction with the instructors; the availability of resources; and the fact that they become more autonomous in the process of reconstruction of their knowledge.

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