Summary

Proplem of the study :

Our educational system doesn't coincide with Individual differences among students. This is clear at the primary stage where students differ in their intellectual, imotional and psychomtor levels greatly. Since science teachers at this stage do not pay great attention to this phenomenon during teaching – this is clear when they direct their teaching towards what they assume to be the average student – and since low achievrs are included in this stage and they do not receive great importance from the educational system due to their low achievement level and their lack of the basic scientific skills and their low attitudes towards sience, the present study seeks to use three teaching methodes and invistigates their effects on achievement ,the development of basic scientific skills and attitudes towards sience.

The study attempt to answer the following main question : " What is the effect of using cooperative learning and Guieded discovery learning and the traditional method on the achievement , development of the basic science processes skills and attitudes towards science among the low achievers at the fifth grade of the primary stage ?

This question is divided into the following sub question?

1 – What is the effect of using coopertive bearning, guided discovery learning and the traditional method on the achievement among the low achievers at the fifth grade of the primary stage?

2 – What is the effect of using coopertive bearning , guided discovery learning and the traditional method on the Development of the basic sciene processes skills among the low achievers at the fifth grade of the primary stage?

3 – What is the effect of using coopertive bearning, guided discovery learning and the traditional method on the attitudes towards science among the low achievers of the fifth grade at the primary stage?

Hypotheses of the Study:

The present study tries to investigate the validity of the following hypotheses.

1 – There are no statistical significant differences at the 0.05 level or lower leveles between the mean scores of the first experiemental group stduesnts which uses cooperative learning, second

experiemental group students which uses guided discovery learning and the control group which uses traditional method on the achivernent test.

2 – There are no statistical significant differences aat the 0.05 level or lower leveles between the mean scores of the first experiemental group stduesnts which uses cooperative learning, second experiemental group students which uses guided discovery learning and the control group which uses traditional method on the test of the basic science processes skills .

3 - There are no statistical significant differences at the 0.05 level or lower leveles between the mean scores of the first experiemental group stduesnts which uses cooperative learning, second experiemental group students which uses guided discovery learning and the control group which uses traditional method on the scale of attitudes towards science.

Sample of the Study:

The sample of the study comprised eighty nine male and female low achievers students at the fifth grade of the primary stage, from three schools in Benha Educational directorate.

Instruments of the study :

The Instruments of the Present Study Include :

- Achievement test at the levels of recognition – comprehention, application.

- Test of basic science processes skills .

- Scale of attitudes towards science .

Procedures of the study:

The present study went through the following procedures:

1 – Atheoritical back ground on :

- Cooperdtive learning .

- Discovery learning .

- Attitude towards science .

- Science processes skills .

2 – Selecting the Two Units Through :

- selecting the two units from the second semester science text book at the fifth grade .

- Dividing the content of the two units into lessons according to the teaching plan.

- Preparing teacher's manual for teaching the two unit using copperative learning .

- preparing work sheets for the students to follow the procedures of the cooperative learning .

- preparing teacher's manual for teaching the two unit using guided discovery learning .

3 – Preparing the Instruments of the Study Which Include .

- Achievement test.

- Test of basic processes science skills.

- Scal of attitudes towards science.

- An achievement test in the previous knowledge.

4 – Selecting the population of the study.

5 – Applying the instruments of the study as a pre-test to the sample .

6 – teaching the three groups using the different methods .

7 – Applying the instruments of the study as a post-test.

8 – Interpreting the results of the study.

9 – Recommendations of the study and suggestions for further Research.

Results of the Study

1. There are significant statistical differences at the level of 0.05 between the mean scores of the first experiemental group and That of the control group in the achievement test in favor of first experiemental group .

2. There are significant statistical differences at the level of 0.05 between the mean scores of the second experiemental group and that of the control group in the achievement test in favor of first experiemental group.

3. There are no significant statistical differences between the first experiemental group and second experiemental group in the achievement test.

4. There are significant statistical differences at the level of 0.05 between the mean scores of the first experiemental group and that of the control group in the test of basic processes science skills in the favor of first experiemental group.

5. There are significant statistical differences at the level of 0.05 between the mean scores of the second experiemental group and that of the control group in the test of basic processes science skills in favor of second experiemental group.

6. There are significant statistical differences at the level of 0.05 between the mean scores of the first experiemental group and that of the second group in the test of basic processes science skills in favor of first experiemental group.

7. There are significant statistical differences at the level of 0.05 between the mean scores of the first experiemental group and that of the control group in the scale of attitudes in favor of the first experiemental group.

8. There are significant statistical differences at the level of 0.05 between the mean scores of the second experiemental group and that of the control group in the scale of attitudes in favor of the second experiemental group.

9. There are no significant statistical differences between the first experiemental group and the second experiemental group in the scale of attitudes.