


# Advanced methods of teaching

Strategies of teaching and interaction teaching  
Drill work , Review , Assignment , Inductive and  
deductive strategy

# Drill work




- Drill is a way to revise a lesson that has already been taught
- Drill work should be based on the principle of learning by doing and on the law of exercises
- Drill is the one of the most commonly used fixed devices.
- it gives a sense of achievement and confidence and so it proves a positive stimulus for further learning.

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- It has been found quite useful particularly in case of average and below average students
  - Drill provides an opportunity to the student to work independently.

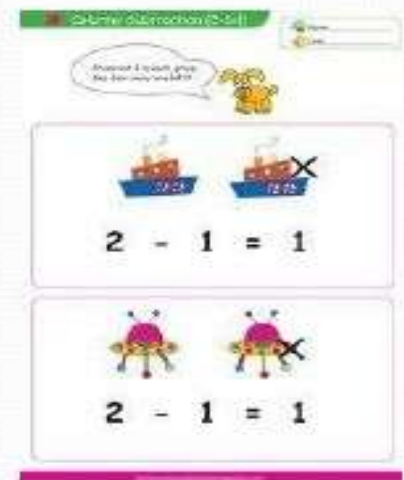
#### Precautions

- Drill work should properly planned.
- It should be meaningful
- It should follow understanding, only then drill work is useful .

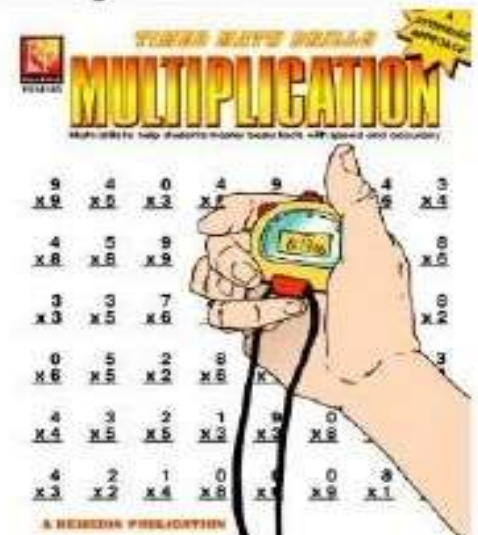
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- Drill work should be individualized to the maximum possible extent. All the students do not have the same level of learning and intelligence. The consideration of individual differences should always be kept in mind.
  - The drill work should always be based on facts taught. New facts or rules should not be given in drill work
  - It should be properly supervised
  - It should be varied
  - It should be never given as punishment



- The achievement of learner should be evaluated frequently
- The teacher should provide proper environment for drill work



- In every subject of the school curriculum there are certain parts or topics which demand drill work in order that they are learnt well, exercises in mathematics, reading, handwriting, spelling in language map work in geography and history etc



Name : \_\_\_\_\_  
Teacher : \_\_\_\_\_

Score : \_\_\_\_\_  
Date : \_\_\_\_\_

5 Minute Drill

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$110 \div 11 =$

$64 \div 12 =$

$44 \div 11 =$

$49 \div 7 =$

$40 \div 8 =$

$20 \div 5 =$

$54 \div 9 =$

$28 \div 7 =$

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$32 \div 8 =$

$72 \div 9 =$

$72 \div 12 =$

$42 \div 7 =$

$21 \div 7 =$

$21 \div 7 =$

$90 \div 10 =$

$72 \div 9 =$

$56 \div 8 =$

$60 \div 12 =$

$72 \div 12 =$

$15 \div 5 =$

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$30 \div 6 =$

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$96 \div 12 =$

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$48 \div 12 =$

$120 \div 12 =$

$42 \div 7 =$

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Name: \_\_\_\_\_

## Common and Proper Nouns

Determine whether each noun is a common noun or a proper noun.

- If the noun is common, write "common noun" on the line.
- If the noun is proper, re-write the noun on the line using correct capitalization.

example: waterfall      common noun  
niagara falls      Niagara Falls

- |                 |       |                 |       |
|-----------------|-------|-----------------|-------|
| 1. march        | _____ | 2. month        | _____ |
| 3. day          | _____ | 4. tuesday      | _____ |
| 5. holiday      | _____ | 6. christmas    | _____ |
| 7. cereal       | _____ | 8. cocoa puffs  | _____ |
| 9. dr. cube     | _____ | 10. doctor      | _____ |
| 11. city        | _____ | 12. boston      | _____ |
| 13. street      | _____ | 14. main street | _____ |
| 15. burger king | _____ | 16. restaurant  | _____ |
| 17. slate creek | _____ | 18. creek       | _____ |
| 19. dog         | _____ | 20. snoopy      | _____ |

# Review

- Review means to view again .
- It is a mental process of going over the learnt materials
- The previous experiences are recalled for better understanding and command
- It involves new relationship and recognition of old materials

## Purpose of review

- To have better understanding
- To fix the knowledge
- To discover relationships
- To develop new interest in old materials
- To link the new with the old

# Revision

easy as

1 2 3






What types of  
review  
do we know?



# Types of review

- The daily lesson review
- Topical review
- Unit plan review
- Co-operative review
- Review by application



### Daily lesson review

Teacher can review what has been already covered on the subject at the beginning of the period. This can be done by summarizing the previous lesson and assignment on it relating it to the lesson in hand. This can be done even by asking 'recapitulatory' type of questions

### Topical and unit plan review

A topic selected and various discussions on it are renewed. It is akin to the unit plan review in which an entire unit or sometimes several units are found necessary and advisable by some teachers. For example various lessons on the mughul period in the history of India have been given, a couple of classes could be devoted to the review of the whole unit or a topic like social reforms in the mughul period could be selected for review

- Co-operative review

It involves both teacher and students, it can be in the form of discussion in which the whole class participates, and it is a sort of mass participation of the entire class in an inter-change of ideas under the guidance of teacher. This type of review is more suited to the students at the college level.

- Review by application

In this type of review students are given opportunities of applying the knowledge gained in new situations or putting into practice all that they have learned in classroom

- Review by making diagrams, sketches, charts, models etc

Good review involves a new way of handling materials, and as such can stimulate children's interest in activity, changing the form of review, the use of the pictorial method in reviewing materials, e.g., preparation of charts, graphs and statistical tables, and the introduction of games and contests are the some of the ways of making a review interesting.

# Suggestion for making effective review

- It should lead to new learning
- It should lead to discovery of inter relationship
- It should lead to continuity, coherence and unity of subject matter
- It should be directed to the weak points or doubts of the students
- Review for main points rather than for details
- Employ review methods which involve visualization
- Review both as short and at long intervals





# Assignment method

- It is a sort of self study which supplements classroom teaching
- In this technique, the teacher assigns work provides guidelines and sets time limit for the completion of assignment.
- This method is generally advocated for teaching different subjects to pupils in the higher classes. The syllabus is split up into significant units or topics, each unit or topic, in its own, is subdivided into learning assignments for pupils

# Types of assignment

- Preparatory
- Purposive
- Remedial
- Study
- Common
- Group
- individual





- Preparatory assignments:  
This assignment is given to find out the weakness in previous knowledge, and skill which are essential for learning new lesson
- Study assignments:
- In this some new topic in learning will be involved the students will be asked to prepare assignment with the help of the teacher guidance, help, reference book.  
This assignment is not be used for lower classes



- Purposive

This is given while learning a new lesson or a topic

Its purposes are

To check up the retention and reproduction ability

To evaluate understanding

- Remedial

It is given in the light of the feedback got from the student's weakness in learning.




# Various steps in the assignment:

- Planning
- Providing guidelines
- Supervising the work assigned
- Evaluating the assignment work





# Inductive and deductive methods

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- In inductive method the pupils are led from particular instances to general conclusion
  - Concrete examples are given and with help students are helped to arrive at certain conclusions or principles.
  - This method is more useful in lesson where rules, definitions, generalisations, laws and casual connections between facts are to be established

**Specific**

INTRODUCTION

Observation 1

Observation 2

Observation 3

IDEA

CONCLUSION

**General**



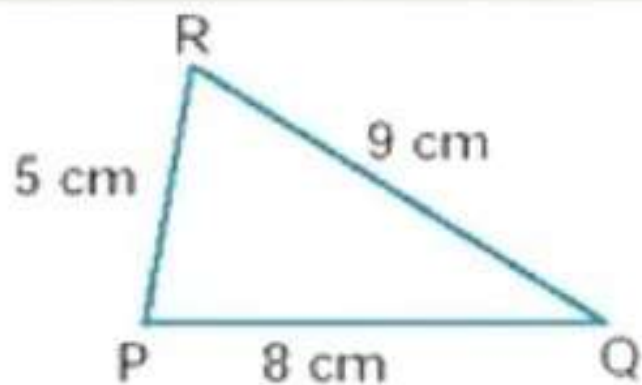




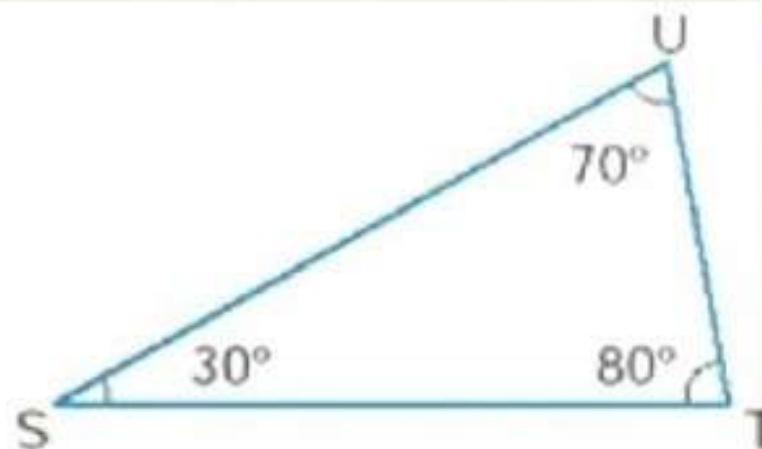
## Example

- To teach the sum of the angles of a triangles is  $180^\circ$  , ask the students to draw triangles with different sets of measurements and measure the angles in each triangle, the students find that in all cases the sum of angles of triangle is  $180^\circ$  thus an abstract idea is established with the help of concrete situations by the students.

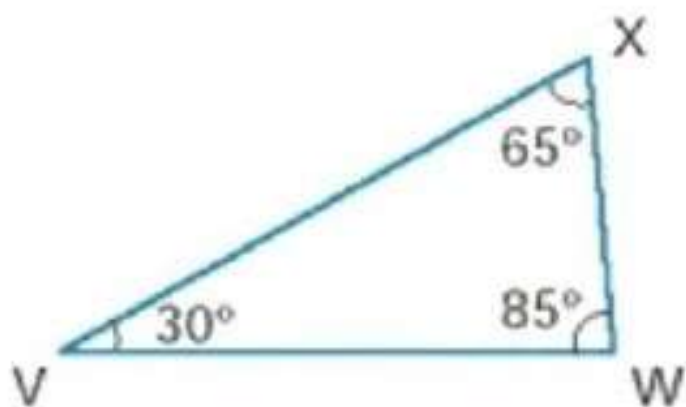
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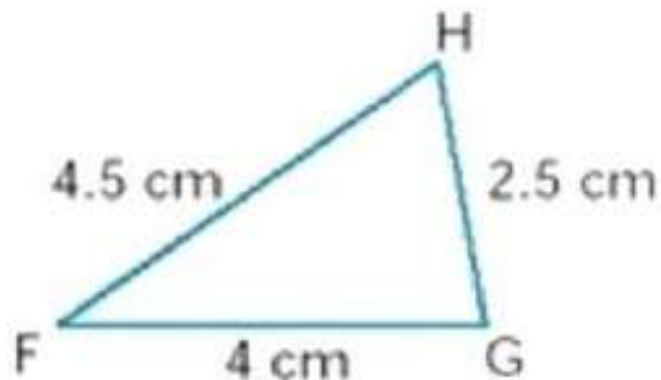
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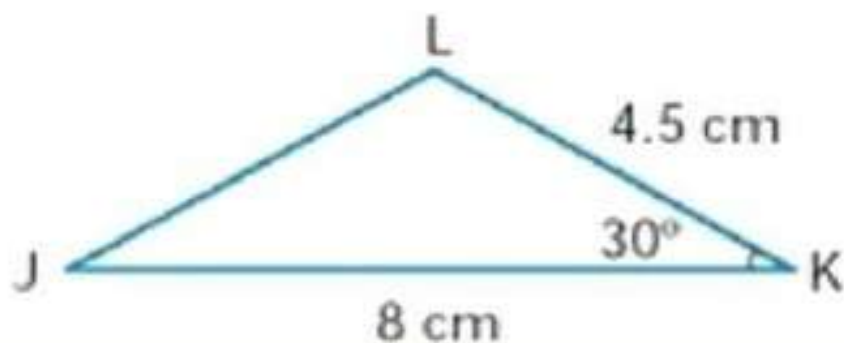
c)




d)



e)



- 
- In language lesson, the teacher while teaching preposition may give examples like
  - ram is in the room
  - The cat is under the table
  - the book is on the table
  - This may lead the students to find out the definition of preposition

# Merits

- It stimulates the intellectual power of the students and sharpens all the faculties of the mind
- It is a scientific method. It places the students on the track of discovery and develops self confidence in the students
- It gives clear understanding
- Active participation
- Independent of rote memory
- Retention of knowledge is high
- It is a psychological method as it moves from concrete to abstract



- 
- It is suitable for beginners

## Demerits

- It consumes more time
- Validity of generalization depends upon the number of particular cases taken up of study.
- After the derivation of the formula or a rule, the next immediate work to be taken is not explained

# Deductive

- Deductive teaching method progresses from general concept to the specific use or application.
- Here the learner proceeds from general to particular, abstract to concrete and formula to examples.
- The rules and generalizations and principles are provided to the students and then they are asked to verify them with the help of particular example.

# Criteria of good assignment

- It should be definite , clear and interesting
- It should sufficiently challenge to stimulate pupil's interest in it
- It should be significantly related to the topic of which it forms a part. It should lead pupil's to meaningful complete learning experiences
- It should appeal to the pupil's curiosity or his desire to achieve a well established interest.
- It should be flexible enough to meet the different range of interests and abilities represented in the group.

# Example

- We say the formula simple interest is  $Pnr/100$  and then apply this rule for the calculation of S.I in every problem where S.I is to be calculated
- We have an axiom that “two distinct lines in a plane are either parallel or intersecting” (general). Based on this axiom, the corresponding theorem is: “Two distinct lines in a plane cannot have more than one point in common.” (Specific). Thus this is an example of deductive method.



# Merits

- this is short and time saving
- It is useful for all topics
- It is suitable for all types of students, even below average students can follow this method
- It increases speed and efficiency

# Demerits

- It is very difficult for the beginner to understand an abstract formula if it is not preceded by a number of instances
- It lays emphasis on rote memory
- Students are passive learners

## **Deductive**

Generalization (or Rule) —————> Specific Examples or Activities

## **Inductive**

Specific Examples or Activities —————> Generalization (or Rule)

Figure 1, Deductive and Inductive Learning adapted from

<http://www.sasked.gov.sk.ca/docs/policy/approach/instrapp05.html>

# Inductive and deductive methods

- It gives new knowledge
- It does not give any new knowledge.
- 2.
- It is a method of discovery.
- It is a method of verification.
- 3.
- It is a method of teaching.
- It is the method of instruction.
- 4.
- Child acquires firsthand knowledge and information by actual observation.
- Child gets ready made information and makes use of it.
- 5.
- It is a slow process.
- It is quick process.
- 6.
- It trains the mind and gives self confidence and initiative.
- It encourages dependence on other sources.
- 7.
- It is full of activity.
- There is less scope of activity in it.



The End

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**Thank you for your attention!**