Chapter III

TRAINING CONCEPTS:-

(a) NEED AND IMPORTANCE OF TRAINING :-

The value of training can be noted down in terms of improvements or increased production, sales, employees' morale, product quality, work method or quality of supervision. So the main aim of training is to minimise the value. Training is also necessary for designing, developing xaliditiong the learing system is any combination of human and material resources. Including the organisation and procedures required to coordinate their functioning system in values a search for ways and means of satisfying the functional requirement.

Thus the need for the training of employees would be clear then observation made by the Authorities of different fields.

1) To increase productivity
2) To improve quality.
3) To help company to meet its future personnel needs
4) To improve organisational climate.
5) To improve health and safty.

6) Obsolescence preventablion.

In both private and public companies need competent Operative,supervisory and managerial personnel, programmes, should be designed to provide employees with knowledge and skill they need to perform their jobs. Thus the need of training is felt. Training more over improves the morale of employee as it helps in reducing dissatisfacton complaints, absenteeism, reduces the rate of labour turnover.

B) Different types of training programme.

Training can be divided into three parts

1) Formal house training.

2) Informal house training.

3) Other forms of training.

GENERAL CATEGORIES:-

1) Formal- in- house training.

a) Orientation of New employees.

b) Sately training.

c) Trade and semi skills training.

d) Technical tranining.

e) Sales training.

f) Sales and delivery training.

g) Human relations training.

h) Middle management development tranining

i) Executive development training programmes.

2) INFORMAL HOUSE TRAINING:-

a) Job training.

b) Job rotation.

c) Coaching.

d) Understanding of existant Assignments

e) Committees of Junior boards.

3) OTHER FORMS OF TRAINING:-

a) Contract training.

b) Self development training.

organisasion climate, placing of the employees.

TRAINING OBJECTIVES :-

Training is no panacea to all manpower problems and so it is neecssary to establish where it would meet a problematic situatoin. When a new high school graduate is hired there is a need to give him some sort of job training so that he may be effective & productive.When a new college graduate is hired to sell there is a need to give him some sort of sales training . when a new machine is brought into the organisation ,the people who are going to work on this machine may need some training .There are many industrial and business problems or situations when training and development programmes will be of a great use.In modern business there are various changes - job changes, organisation changes, method changes,changes in personnel,changes in the volume of business etc.Which are constantly taking place and that necessitate modification of understanding, attitudes and skills on the part of the personnel.They create needs. That can be stated as training needs .

The following formula is suggested to indicate the specific training needs :

Training needs = job requirements - Employee's Present job skills. This indicates that there is a need for careful job analysis of the indivudial employee. A survey of over all training needs of an organisation may be conducted periodically with the active support of top management.There may be a few doubting Thomases,who may just pay lip-service to training who may think it is just another personal gimmick and it is of no practical value to the organisation at all.

They must be converted by pointing out the specific result of training and that training is a practical necessity which results in the reducation of waste and spoilage,improvement of methods,reduction of absenteeism and labour turnover,reduction of learning time, reduction of supervisory burdan,reduction of overtime costs,reduction of machine maintainance costs,reduction of grieances, improvement of quantity,encouragement of upgrading reduction in accident rate, improvement of communication, improvement of morale and improvement of efficiency and productivity .

Some metods of determining training needs are through job analysis,tests,moral and attitude surveys personnael audits,activity analysis.

METHODS OF DETERMINING NEEDS :-

1. **Analysis of an activity (Process Job operation) :-**

To list as steps in a logical sequence the activities involved in producing a product or service or part thereof and determine what new knowledge or skill is calleds for or present knowledge or skill is to be modified.

2. **Analysis of problems :-**

To analyse problems and determine what additional skills,knowledge or insight is required to handle it.

3. **Analysis of behaviour :-**

To analyses typical behaviour by individual or groups and determine the corrective action involving

4. **Analysis of an organisation :-**

To analyse organisational weakness to produce clues to training needs,both individual and group.

5. **Appraisal of performance :-**

To analyse performance and determine if someone should get something be it additional knowledge , skill or understanding.

6. **Brainstorming :-**

To bring together a homogeneous group and to ask individuals in group to call out any ideas they have for ansewring a "How to" question and indentify items which call for additional knowledge or attitude.

7. **Buzzing :-**

To ask an outstanding of supervisors,managers, profesonal personnel or other (as long as it is homogeneous) can be given a question such as "What are desirable next step in our training" or "What additional areas of knowledge (or skill or understanding) do we need to handle our work better."

8. **Card sort :-**

To write statements or potential training needs on cards had them over to the person whose ideas are sought to arrange these cards in what he feels is their order of important for him.

9. **Checklist:-**

To break down a job,process,programme,activity or area of responsibility in to a list of deleted parts or steps arranged in logical sequence and check off by each individual the items about which he feels he would like to have more skill or knowledge.

1Ø. **Committee:-**

To constitute an advisory committee composed of persons responsible for or with a direct interest in an activity to identify learnning needs.

11. **Comparison:-**

To compare what an individual is doing (contemplates doing) With what others are doing or have done to learn about new ways to handle old problems keep up to date on new techniques and procedures fight his own absolescence.

12. **Conference:-**

To indentify learnning needs and make decisions and ways these needs will meet in a conference of persons concerned with an operating problem.

13. **Consultants:-**

To employee outside consultants to determine learnning needs and develop ways to meet them.

14. **Counselling:-**

To discuss between a training practioner and a person seeking guidance regarding ways he can improve his job performance or prepare for advancement.

15. **In basket. :-**

To measure or test manager's ability to handle some of the day to day challenges which come to him in writing in his "infox" from various sources.

16. **Incindent Pattern.**

To note in terms of success or failure the response to special situations and to study the pattern of deviation.

17. **Informal talks:-**

To meet and talk informally with people for finding clues to training needs.

18. **Interviews:-**

To arrange a formal meeting with the person or group concerned employing the interview technique.

19. **Observation:-**

To observe such things as may have values as indicates of training needs,espacially needs which are just under the surface or emerging.

20. **Problem clinic.:-**

To arrange meetings of a homogenous group to discuss a common problem and develop a solution.

21. **Research:-**

To indentify implications for training and development as a result of research.

22. **Role playing.:-**

To get dues to his training needs in a skill an area of knowledge or in understanding or attitude by observing how each role player acts in role playing situation.

23. **Self analysis :-**

To self evaluate and know what is needed in theory of additional knowledge skill or insight .

24. **Stimulation:-**

To analyse performance in stimulation exercise to reveal individual and or group training needs.

25. **Skills Inventory:-**

To establish and annually up to date an inventoryof the skills of their employees and to indentify gaps or blind spots in reserve or stand by skills.

26. **Slip Writing:-**

To undertake studies which can turn up training needs which will have to be met if the plans are adopted.

27. **Studies :-**

To undertake studies which can tern up training needs which will have to be met if the plans are adopted.

28. **Surveys:-**

To undertake studies which can be used to take inventory of operations, employees attitudes, implication of advanced planning etc.

29. **Tests:-**

To perform tests to measure skill, knowledge or attitude and to identify gaps.

3Ø. **Task Force:-**

To constitute a task force which in analysing the problem may unearth training needs which must be met before their recommended solution to the problem can be implemented.

31. **Questionnaire:-**

To develop a questionnaire to elicit information which can be used to determine training needs delimit the scope of the training identify course content etc.

32. **Work Shop:-**

To identify in a workshop the needs for further understanding or insight about organisation goods or operations.

TYPES AND TECHNIQUES OF TRANING AND DEVELOPMENT.

1. Initial or Preliminary Training:-

Initial or preliminary training is designed to meet the needs of new employees of an organisation who have had no industrial experience. The new employees may not have even seen the inside of the faulery and they are "green" hands. Either through a Company training institute or public vocational schools the learner may be given training for a period of several weeks in two broad Categories of employee training:- **(1) general education and (2) job training.** The learner, as one Company does may be given training in an elementary arithmetic shop science, economics, mathematics, reading blue prints, operation of machine, reading and using gagues, fire fighting, safety and good house keeping.

The foreman may be asked to teach the learner what is the job, what has to do on the job, how he has to do it, when and where he has to do it and why?

The first few weeks are critical for both the learner and the Company and the training the learner receives, hence are all the more important.

2. Non - Supervisory training:-

During the Secund World War, with a view of meeting the job training needs of Companies, the War Manpower Commission under the sponsership of the Council of National Defence in U.S.A. developed standerdised training programmes, that could be used in almost any Company known as Training Within Industry or popularly TWI. TWI.programmes have been enormously sucessful and these were introduced in our country with the assistance of I.L.O. experts. Apart from the actual job training TWI also instructs the instructor as to how he should instruct Under the TWI method here is how a job training programme is planned & developed.

THE PROGAMME DEVELOPMENT

The four steps were established as,

1) Spot a production problem.

Get supervisors and workers to tell about their current problems.Uncovered problems by reviewing records performance,cost,turnover rejects,accidents.

2) Develop a Specific Plan.

Who will be trained?

What content?

Who can help determine?

How can it be done best?

Who should do the training?

When should it be done how long will it take?

Where should it be done?

Watch for relations of this plan to other current training plans and programmes.

3) Get Plan into Action.

Stress to managment evidance of need useful and figures.

Present the expected results.

Discuss plan centent and methods.

Submit time table for plan.

Train those who do the training.

Secure understending and acceptance by those affected.

Fix responsibility for continuing use.

Be sure management participates.

4) Check Results.

How can results be checked?

Against what evidence?

What results will be looked for?

Is management being informed -how?

Is the plan being followed?

How is it being kept in use?

Are any changes necessary?

Is the plan helping production?

Job training may be broken down into various types of training.

The most common types of non - supervisory training programmes are discussed below:

1. **On the Job training:-** This type of training is usually adopted where jobs are varied to permit the establishment of group instruction. It is also used where machinery to be provided for trainees is too costly. The general set up is to assign a new employee to an older and experienced employee so that the new

employee learns the skills of jobs gradually by observation as well as occasional handling of the job . Sometimes a supervisor may be there to train him while he is doing the job. Sometimes training on the job is supplemented by instruction in a classroom.

It has been found that this type of training is carried on in a haphazard manner for a variety of reasons such as lack of ability of the experienced employee to impart skills to the trainee, lack of a breakdown of the job for the purpose of instruction and lack of motivation on the part of the trainees to impart skills.

However the job training is being commonly used in a large number of organisations,mainly because it requires no special school and trainees contribution adds to the total output of the department. Careful selection of trainer and assinging a new employee to the proper trainer is very important. There is no need to train the trainer also. This type of training is a reasonable alternative for a company where there are almost as many jobs as there are employees. The job training is applicable to all levels of jobs operative supervisions and executive trainees.

2)**Vestibule Training:-**

It refers to job skill training which is shorter than the apprenticeship programme and is given in a regularly established school. It is designed to equip the learner with only one phase of training to operate one machine or to perform a single operation. The training is carried out in a miniature of situation of the real plant so that the trainee can practice those skills which he will later use on the job. Thus his training is closely geared to job duties. The theoretical instruction is given in the class room while the practical work may be done on the shopfloor when no shift is working. The emphasis in this type of programmee is on training as well as on production. The training school may accept materials for processing on a contract basis and return the same after the job is done. Thus the vestibule training not only imparts training to the young persons but also carries out some sort of production process.

Many of the larger industries employing considerable number of semiskilled people have established vestibule training programme. In this progrtamme there is a greater emphasis on practice and less on theory.

The training skills in the school closely approximate the operations on the job. This training is carried out in a well controlled situation unlike on the job training.

3) **Craft Training:-**

Preparing an employee for a craft has been one of the oldest types of training. Craft training is more complicated than job training, as craft is more complex, difficult,comprising generalised knowledge,skills,& attitudes. The training period is much longer. Craft skills are acquired by becoming an assistant to craftsman by a formal apprenticeship or by a company training programme.

APPRENTICESHIP TRAINING:-

The craft training is mostly gained through apprenticeship training. This type of training was available as early as 2100 B.C and mentioned in Babylonian code of Hammurabi. It has been in vogue in medieval times and in the colonial days in U.S.A. In England at the peak of power of craft Guilds it was necessary for anyone wanting to become a craftsman to put in seven years of apprenticeship with a master craftsman. This type of training was common in our country also.

In recent years both in U.S.A. and our country apprenticeship programmes have been regularised by public policy, union and management agreements. Apprenticeship involves training for total job where acequiring the knowledge and skills of a trade requires fairly long period any where from two to seven years. The fields in which apprenticeship training is offered are numerous such as Boiler Attenders, Draughtman, Mechanist, Printer, Tool Maker, Patten Maker, Mechanic, Carpenters, Shiftters, Jewellers, Die Sinkers, Plumbers, Engravers, Coremakers, Electricians, Millwrights.

Training is mainly concerned with development of skill and knowledge and basis of extensive theoritical and pracfical study. where skilled persons are not readily available it becomes necessary to establish apprenticeship programmes. These programmes may be delegated in part or in whole by the company to a vocational school. Larger Companies that employ enough crafstmen can run these programmes enonomically at any rate until their requirements are fulfilled.

A modified form of this type namely, Co_operative programme can be tried out where in shop practice is only on the job under the direction of a skilled crafstman while classroom instruction is given in a local school or institute. Apprenticeship programme extends over a long period and is too costly for smaller companies particularly when traniees leave the company soon after the training is completed. But it is the only alternative where ready skilled help is not available. Sometimes it involves on the part of the trainee signing an agreement to serve the company. This programme is carried out in an informal set up without having a separate training department. It has been generally charged that not enough attention and facilities are provided for apprenticeship training

programme because of the long time it takes to prepare the traniees for work. Sometimes these trainees are used by companies to augment their permnent work force.

The federal Bureau of Appernticeship lists the following advantages of apprenticeship tranining.

1) Maintenance of skilled work force.
2) Immediate return from training.
3) Quality Workmanship.....
4) Satisfied Customers.....
5) Higher Production.....
6) Lower hiring costs because of reduced turnover.....
7) Lower production Costs.....
8) Increased loyalty of employees.....
9) Opportunity for youth.....
1Ø) National Security.....

APPRENTICESHIP SCHEME IN INDIA:-

Considerable fillip has been given to the apprenticeship training in India by the Aprenticeship (Amendment) Act 1973 and also recent public policy.

Freshers as well as trainees of the III's are eligible for apprenticeship and latter rightly enjoy some exemption in the term of apprenticeship. This period for most trades is of 3 years but for a few it varies between 6 months and 4 years. In England the normal period of 5 years while in the United States it varies between 3 1/2 years to 4 years. In all countries apprentices are paid stipend which generally carries an annual increament. In India too the stipend increases from say Rs. 13Ø p.m. in the first years to Rs. 2ØØ p.m. in the fourth.

Graduate engineers receive minimum Rs. 28Ø p.m. Though a trainee is not a worker, he does produce some goods and services. The stipend may therefore be interpreted as a remuneration for work done. The cost of scheme in India is borne entirely by an establishment if it employs 5ØØ or more worker and is shared with Government if it employees less. The financial burden on the establishment and the Government would be made a

little lighter if levies are imposed on establishment which default. But this suggestion has not been acceptable to the Government despite the failure of the employers of Co_operative.

PENALTIES PRESCRIBED:-

As in other countries, so in India, the Act requires that a contract should be singned between the employer and the apprentice or his guardian. This contract binds the trainee to observe certain rules and regulations and the employer to train the apprentice in a trade. An employer can be fined or imprisoned for 6 months if he fails in his obligations and a trainee has to repay Rs. 35 p.m. upto a maximum of Rs. 5ØØ if he abandons his training half way. The provisions regarding refund may differ some candidates, especially those coming from the weaker section, participating from the apprenticeship scheme.

A distinguishing feature of the Indian Act is the final trade test, which is necessary for every trainee to pass. In England no final examination is held while in United States an examination is held for the licence to practise the trade; but the system lacks standardisation. The Indian Act provides for prizes and

medals for the best apprentice and the best establishment.

Entranship training is a work and study programme, where the trainee attends a school for theory sessions of the training periods may range 3 to 9 months of the trainee alterante from school to plant & vice versa until the course is completed. This programme is offered through trade school, highschool and vocational schools.

EXTERNAL TRAINING:-

In our country external training is offered by various agencies such as Industrial training centre NPC, SSI, Correspondence courses night schools etc.

RETRAINING :-

Facing problem in industrial worker is Job absolensance where Job may become absolute because changes brought by technology.

Generally the employee. Whose Job has gone absolete is maintined on payrol and retrained to another Job so the advancing technology can be harnessed to the benefit of the company.without any adverse effect on the emplyees.

SPECIAL PURPOSE COURSES:-

Various special purpose courses are offered by companies to meet special unusual needs of employees. In U.S.A. special purpose course are designed to help the employees for to eco, home eco, civics, basic english.

TRAINING FACILITIES:-

1) Training Institute and Schools.

2) Films, slide projects.

3) Charts, graphs, flash cards.

4) Library and reading rooms.

5) Exhibit, posters, display.

6) Cartoon comic books.

SUPERVISORY TRAINING :-

The term supervisor formen are often used interchangebly, and they are all alike in that they supervise employees. The supervisor is main communication link between manager and employees, one who has to get things done through his men. Supervisor has a very important role to play to many firms with a policy of promotion from within, must largely limit the selection of future Junior of middle managers to choices among formen and spervisors.

Mgt is intersted in spervisor training of development programmes for a variety of reasons. 1st co expends it needs more supervisor, hence there is need to augment the source of supply.

Secndly supervisor develop programmes are often the basis of executive development programmes. Thridly each department needs a good supervisor as its head, fourthly good supervision is responsible for good team spirit, and lastly top management realises that there is a need to keep the supervisors in good shape all the time.

TRAINING IN WORK METHOD FOR HIGHER EFFICIENCY IN LOOMSHED

1.Ø GOOD WORK METHODS DECIDE LONG TERM AVIABILITY

Work methods or work culture in a mill right from management level to shop floor, is one of the key factors resopnsible in deciding long term viability of the mill. The mills which have been taking this function seriously, appear to have reaped the long term benefits fo maintain satisfactory standards of productivity and quality which are a must to contend in the ficrcely competative business environment.

2.Ø WHAT IS MENT BY GOOD WORK METHODS?

Work methods involve attitudinal, and value dimensions in doing a job and cannot be equated just with skill level. Work methods cover various aspects; some of these are as follows.

i) Following orderly procedures.

ii) Doing a job promptly, accurately, neatly and speedily.

iii) Checking and correcting the work.

iv) Being care about machine maintenance.

v) Taking parts care of spare parts.

vi) Petrolling machines to minimise stops and defects.

vii) Keeping machines clean.

viii) Adopting proper material handling methods.

ix) Seeing the job as a whole and not only a part in is machine.

x) Proper handling and care of tools and gauges.

xi) Following saftey and health precautions.

xii) Keeping one self busy in work.

xiii) Keeping proper conduct in work.

xiv) Accepting criticism for making improvements.

xv) Getting along with others.

xvi) Being co-operative.

xvii) Following orders and directions.

3.Ø FEATURES AND EFFECTS OF PROPER AND FAULTY WORK METHODS.

Some of the main features and effects of these two methods are as follows.

PROPER WORK METHOD.	FAULTY WORK METHOD.
1. It makes easy to carry out operations.	1. Operations become complicated.
2. There is lining for the job.	2. There is unwillingness for doing the work.
3. Physical efforts are low and hence the worker is all the time active and vigilant and speedy.	3. Working become timesome and hence the worker becomes lethargic and negligent.
4. There is a feeling of satisfaction and mind	4. It causes dissatisfaction and mind gets disturbed.
5. There is saftey.	5. There are chances of injury and accidents.
6. Supervisor workload gets reduced.	6. Supervisors worklood get increased.
7. The work is done efficiontly and hence in a shorter time.	7. Efficiency and spped of doing work get reduced and hence it takes long time to do the job.

PROPER WORK METHOD.	FAULTY WORK METHOD.
8. Waste caused is low.	8. Waste caused is high.
9. Life of machines and accessories increases.	9. There is increase in consumption of spares and stores.
1Ø. There is improvement in quality of products.	1Ø. The quality of products gets deterioraed.
11. Fresh paking increases.	11. There is increase in seconds.
12. Thore is increase in machine productivity.	12. The productivity gets reduced.
13. Machine allocations can be increased within permissible worklood.	13. There is little chance of it, conditions may force even to reduce
14. Manufacturing expenses get recored.	14. Manufacturing cost increases.
15. Worker, mill, nation earn lreputation as well as more money.	15. No one is benefitted-all suffer loss.

4.Ø IMPORTANCE OF WORK METHODS IN LOOMSHED.

The out-put from loomshed, both interms of and quality is one of the most important factors affecting profitsbility of a mill. However, large difference in this out put among weavers within the same mill as well as between mills are not unknown. On analysing a mills data it is often found that among weavers working on same looms in defferent shifts, the fort-nightly efficiency of some weavers is consistently high and of some consistently low. The differences can be raised mainly to work methods followed by workers.

The experience in operative training so far has revealed that in the wide range of operations in various departments of a composit mill, attention to training in work methods in a small set of critcial operations can bring about substantial increase in productivity and quality. Weaver's work is one of such critical operations. Our survey data shows that just by improving work methods in loomshed, the weaving efficiency in nonautoshed can.

1. Training of weavers and jobbers for bettor productivity, proceding of 39th All India textile conference page 175 to 199 be increased in most of the mills by 5% and in some specific cases by as much as upto 20% (1,2).

In this paper, therefore, details of work methods specific to non outoshed weavers have been discussed in subsequant sections.

5.0 REASONS OF WEAVER ADOPTING FAULTY WORK METHODS.

It is not the person but the method of his working which makes him a good or a bad weaver. Good or poor methods of working are a result of the habits acquired by a weaver during his learning period. The resource of acquiring faulty work methods can be any of the following.

1. **Lack of fresher training.**
2. **Poor culture of department.**
3. **Slackness in checking of productivity and quality.**
4. **Lack of interest of depertmental supervisors and management.**
5. **Heavy workload.**

6. Lack of motivation.

7. Negative attitude of worker.

8. Lack of refresher training.

In a majority of our mills, weavers have not been given any systematic refresher training and hence many of them have acquired several work habits which are not conductive of giving good results. Most of the weavers learn to run looms secretely while giving tiffins to their relatives in loomshed. When such persons get formally recruited in the mill, they learn the job generally under supervision of their relatives or through trial and error and seeing other weavers. The new recruits consider the senior weavers, expert and teachers, and blindly follow their work methods. As a result of this style of learning, different styles of work methods among weavers get established. A number of these methods, pointed out earlier, are not conducive of giving good results.

6.Ø DESIRABLE WORK METHODS OF WEVERS.

1. What should be proper work methods of weavers and which of the faulty work habits acquired by them, need.

2. (a) How to Assess and improve loomshed efficiency, ATIRA circular Report, MPC/124, Feb. 1982.

(b) Process control in weaving, ATIRA monograph, second edition 1983, page 181.to be ammended, are discussed here in some detail. These recemmendations are made on the basis of discussions held with weaving staff of mills as well as our experience in weaver's training. It is not possible to cover all the points in this paper, even so an attempt has been made to list a large unmber of them under various sub-autoloom weavers only since it is mostly these weavers who have remained unexposed to any systematice training.

AT START OF SHIFT.

1. Reporting 1Ø minutes before start of shift to know the position of stopped loom(s), new beams gaited knotted, stock of weft pirns, a pair of shulte for each loom, minor reparirs, running damage, running out becames, etc and doing the needful.

2. On taking chargo, checking of looms for let-off weights (by feeling pressure on fabric); working of warp stop, weft stop and anti-crack motions; and checking ccndition of spare shuttles and fixing of prins in them.

3. Within 5-1Ø minutes of starting the shift, stopping the looms one by one land checking conditions and settings of running shuttles, should lines, leather accessories like pickers, buffers, packing, bands, check strap etc, land cleaning shuttle boxes with a cloth piece and lubrication lightely the picker spindles.

AT END OF SHIFT.

1. Handing over looms to the next weaver with proper condition of warp, fabric, shuttles, pickers, leather accessories, and the let off weights should be properly adjusted.

2. Not leaving any broken ends undrawn or in cross.

3. Stock of pirns of the looms should be sufficient for two hours working.

4. Any minor loom repairs should be got repaired before and of the shift.

5. Keeping the cloth doffed if the licence mark has come in the cloth roll before the end of the shift.
6. Not slowing down deliberately the working of a loom for beam chage to take place in the next shift.
7. Giving all relevant information to the next weaver for proper working of looms.

LOOM SUPERVISION AND WORK CULTURE.

1. Not leaving his loom just for gossiping with othersers. Stopped looms should be attended immediately.
2. Not deliberately reducing the speed of looms without understanding. Ensuring that the speed is not lower than the nominal.
3. Keeping both the spare shuttle in time.
4. Filling in the spare shuttle in time.
5. When more than one loom is stopped, attending the looms by giving priority to these which can be started in a shorter time.
6. With all the machines running, going on back of looms to check beam ends and attending to faults, if any, such as big knots, big slubs, crossed ends, taped ends, etc.

7. Doing shuttle change by stopping the loom just before exhaust of yarn of the running pirn, keeping the weft waste not more than 5 metres.
8. Regularly checking running looms for proper working condition of ends form cloth foll to back rost and for defects in fabrics, and rectifying the defects, if any, immediately.
9. Before doffing cloth from a loom, checking other looms in front and back for no faults in warp and attending to shuttle changes so that these looms, as far as possible, do not get stopped or give damdage in fabric when the weaver is busy in cloth doffing.
10. Noting down daily, weekly and monthly loom efficiency' figures of own and other shift weavers of these looms and making attempts to give the highest efficiency.
11. Handing over looms to reliever in good working conditions, informing him of any special care precautions to be taken and coming back in time.
12. In case of fine constructrion fabrics, not pressing fabric or warp sheet when the loom is running, as this will give distorted weaving.

13. For unweaving fabric defects, using comb in right manner and ensuring that on reweaving no defect is visible.

SHUTTLE FILLING AND SHUTTLE CHANGE.

1. Checking that the wet pirns put on the loom beard are of proper count, have proper build, are defect free at tip and bottom, have no tail ends at bottom, are clean and free from stains, and the weft board is covered from 3 sides.

2. Using clean hand for handling pins.

3. Checking for firm grip and proper alignment of pirn in shuttle.

4. Threading the weft appropriately in shuttle eye and checking the shuttle for its condition.

5. Not causing big chappats, but running the pirns with not more than 5 metres waste when the loom is stopped by hand for a shuttle change.

6. Reworking the chappats caused due to weft break and having yarn content more than 10% of full pirn content.

7. Doing pick finding at weft break and shuttle chage, not matching the pick within the shed but by taking out the partial pick from full width of the shed such that the free ends of both the old as well as the new weft are outside the selvedges.

8. While taking out or putting shuttle, taking care to lensure that reed and or warp end are not damaged broken due to improper handling throwing of shuttle in the shed.

MENDING OF WARP ENDS.

1. Ensuring that the bunch of warp threads tied on the loom for mending broken ends, is from the cut tail ends of drawing in tying-in of the running beam only.

2. Mending the broken ends immediately and never weaving with missing ends in fabric by waiting for broken ends to become sufficiently long for drawing in without the need of knotting.

3. Mending ends with clean fingers and keeping a cloth piece tied on loom for wiping hand.

4. Using weaver's knot.

5. Using appropriate drawing hook and inserting it straight instead of in angle to avoid damage to heald eyes and reed dents.

6. In mending multiple and breaks, avoiding putting of knots side by side.

7. Keeping drawn and straight without crossing with other ends, and cutting the protrading end before the fabric passes beyond the breast beam.

8. If the end is broken behind lease rods, straightening it right from the beam before knotting it with a spare thread.

9. Tying spare thread with the broken warp thread only after breaking the latter about 2 from the broken side, and cleaning off knots, fluff, if any, in the adjacent ends.

1Ø. In case of missing end, taking the nearest extra end for mending, and taking it over a spirla spring put over the back rest so as to avoid undue increases in tension and abrasion.

11. Correcting the cross lends as soon as the missing ends are available.

6.6. MECHANICAL CONDITION AND SETTINGS OF LOOMS.

1. Being attentive to any discrenting sound coming from running loom due to improper flight or boxing of shuttle, loose spring of stop rod, loose reed, non-alignment of rood, weft fork touching girds, disturbance in tunning of looms, etc. If any defect is perceived, stopping the loom and informing the jobber.

2. Ensuring that the rood as not get so rigidly that during shuttle trap the rood does not come out properly and easily from the sley race.

3. Ensuring that any packing put between reed baulk and sley cap is held rigidly, if it is loose or comes out, the loom should be stoped and the jobber be informed.

4. While opening the strings from botom for shed adjustment, ensuring that the knot put on the string tied to the bottom of the heald frame is not opened.

5. After 15-2Ø minutes of working with a new picking band or a leasther check strap, stopping the loom and tightening these appropriately to take cave of initial high extension.

6. Not repairing by himself any machine or setting fault without having full knowladge.

7. Always ensuring that the sectant or anticrack motion is put in working position.

8. Not making warp stop motion ineffective, some weavers have bad habits of either making the whole motion dofunot or of bending some drop pins at top, to run looms with missing loose ends.

9. Not tying brake handle with shuttle stands, otherwise the brake does not function efficiently and this can cause starting makes.

1Ø. Not moving brake wheel with only hands and keeping the brake lining always clean and rough.

11. When it is required to increase picking force, not tightenicng picking band or bringing picking stick in side or lowering down the picking bowl, beyond limits.

6.7. CARE OF LOOM ACCESSORIES AND LOOM PARTS.

1. Keeping heald frames, reed and warp stop motion serrated bars along with pins of a cut beam carefully at safe place on one side of the loom.

2.When a new part of accessory is put on a loom, checking it after a few minutes working, such as a new picker for shuttle strike on it at right point, a new shuttle for ensuring that it is not getting abraded or is not hitting wrongly against any loom part, etc, and informing the jobber if any corrective.

3. Putting a new picker first on the correct side and changing the side of the picker approximately midway through the estimated service life.

4. Changing worn out bushes of plastic pickers in time.

5. Using a new picking band having punched hole at not more than 2 cm from its end for securing it with picker by means of a wooden peg and never slitting the band to insert the peg.

6. Keeping number of wraps of picking band around the picking stick more on the front side than on back.

7. Not using metal hook but only a leather strip on picking stick delivery and to hold and guide the picking band, and keeping picking stick smooth at the delivery end.

8. Not using old pickers in place of buffer.

9. Keeping the length of the picking band between the picker and the shuttle such that when the loom is at back centre, the picker moves freely on the spindle and when the picking stick is at the innermost position, the distance between the picker and the buffer is about 6 cm.

1Ø. Not mending damaged donts of a reed by using knife, reed hook, shuttle, etc. but calling the reed-man only to do this job.

11. Not using iron hook but only a wooden peg to join check srtap with its buckle, otherwise the shuttle box cottom plate gets badly worn out on front side.

6.8. CARE OF SHUTTLE

1. Not using oil in shuttle tongue holder or any other part.

2. Giving shuttles for repairing to only jobber or carpenter and not doing repair work by one self.

3. Not grinding bad shuttle on emery roll.

4. Checking the shuttle tip for its proper fixing by moving a fine thread over from tip point to body of shuttle and ensuring that the thread is not held any where.

5. When shuttle falls on ground, checking it for smooth surface of tip point by fingers.

6. Not keeping any of the two shuttles in unworkable condition for a long time.

7. Informing jobber when shuttle box setting are too tight, picking force is harsh, shuttle rebounds, or reed-box alignment is not proper-since these affect the shuttle adversely.

6.7. OPERATIONS DURING BEAM CHANGE

1. Helping jobber in doffing of exhausted beam and in getting & starting of new beam on the loom.

2. Replacing the old bunch of warp threads tied on the loom, by that of the new beam.

3. After getting khotting of a beam starting the loom with proper pick wheel and proper weft yarn after seeing the beam slip.

4. If the new beam is to be knotted, checking that there are no missing ends either in body or in solvedges and all the ends are drawn correctly through healds and reed in the exhausted beam.

5. Ensuring correct pattern in fancy fabrics.

6. When warp lengths are available, continuing weaving of the exhausting beam even beyond the last licence mark,and starting weaving of the new beam even before the first licence mark so that the waste of warp sheet is the minimum.

7. Mend all the broken and missing ends within a few inches of gaiting knoting of a beam without waiting for the first licence mark, and marking on traffic from the place of starting defect free weaving.

8. Doff the cloth of the old beam as soon as the cloth of the new beam comes on the cloth roll.

9. Enduring that the plastic or cloth used for covering beam and loom fabric, is put back on staring of the beam.

1Ø. At the time of putting lease red in the shed, covering the leading and of lease red with a cloth piece for its smooth passing between the warp threads.

6.1Ø. CLEANING AND OILING OF LOOMS.

1. Cleaning heald frames, sley cap and wept fork gate by a cloth piece at least twice a shift.

2. Keeping loom at front centre and covering the women cloth, during any loom cleaning on the front side.

3. In a running loom not doing cleaning by blowing off fluff etc.

4. At spare time, removing cutting pluff if it is accumulated at warp stop motion pins, and cleaning dirty gears of take up motion.

5. When a beam is cut, getting the loom thoroughly cleaned and properly oiled.

6. Not puting to much oil on let-off chain wound on the beam pipe, packing and shedding bowls, foot step of picking shaft and crank arm.

7. Ensuring that oil does not fall or come on brake linings.

6.11. SAFTEY AND AVOIDING ACCIDENTS

1. Not standing on handle (drive) side of a running loom since the chances of shuttle flight are more on this side than on the off side.

2. Not sitting on breast beam of a running loom, the person may get hit by picking sticks.

3. Not cleaning a loom when it is running.

4. Always ensuring that saftey guards of gears, drive, etc, when removed for any repair work, are put back properly before reworking of the looms.

5. Checking for correct setting of shuttle guard put on sley cap.

6. Using right spanners for opening and tightening and bolts, and not using nut bolts having wornout heads and threads.

7. On a loom stopped for reparing, keeping shuttle up side down on fabric at breast beam.

8. Not attempting to repair any electrical faults by oneself, but only by a wireman electrician.

9. Getting the drive belt put on pulleys only by those who know the job properly.

10. Using appropriate extingusher at the time of fire.

11. Not working on the loom with loose dress and slippery shoes.

12. Keeping floor in the loom passage free from oil, pirns or any spare parts.

6.12. HEALTH AND WORKING ATMOSPHERE

1. Not spitting here & there but only in a spit-pan.
2. Not sucking weft for threading it in the shuttle eye.
3. Not running to weft distributor out of trun.
4. Not remaining absent without taking leave.
5. Whenever occasion demands,helping jobbers, neighbouing weavers and other workers with sincerity.
6. Putting up difficulties not with a view to blame persons but in a manner which will help in sloving the difficulties.
7. Regularly looking for learning new jobs and improvements in styles of working by carefully watching jobbers and efficient weavers and seeking classifications in case of doubts.

7.Ø WHAT TO DO TO DEVELOP GOOD WORK METHODS.

Our experience reveals that weavers of those mills which have training centre and where the weavers are training systematically, differ cinsiderably in work methods from weavers of these mills which do not have training activities. The correct work practices followed by former group of weavers are collective efforts of trainers, supervisors, and departmental heads with full support from the mills' managements. Therefore, if correct work habits are to be ensured, it is very desirable to have training centres for freshers as well as refreshers.

7.1 SOME RULES ABOUT DEVELOPING WORK HABITS.

1. A work method should always be practised under the conditions in which it is to be used.

2. To develop a work habit it should be practised correctly from the start, repeated several times and in the same way until it is fully established.

3. Having established a work habit, master it by practising under a wide variety of situations.

4. To improve a work method, it should be compared against a standard.

5. A work habit which has want because of disuses can be more easily revived than learnt in the first instance.

6. To break a faulty work-habit, the only way is to prectise a correct one in its place.

7. A work method can be learnt most efficiently when it is practised under the direction of an instructor who is himself master of the method.

8. A work method is learnt and adopted more quickly and efficiently by a learner who is interested in acquiring it.

9. The trainer should not get disheartened by not seeing progress in the work methods of a trainee since there are always peiods of rest and advancement in learning.

7.2. ROLE OF A TRAINER

In order to make a weaver efficient in proper work methods, following steps should be taken.

1. Studying thoroughly the work methods being practised by different weavers in the mill preferably without being noticed by them and preparing a list of the methods which need to be developed and which need to be broken and improved.

2. Practising proper work methods by himself in order to demonstrate these as a standard to the trainees.

3. Showing to weavers how the wrong work methods are harmful and how proper work methods are beneficial through various examples and exhibits.

4. Not scolding the worker if he is not following the corrrect work methods, but making him understand properly how to do by providing proper guidance and encouragement.

5. Informing supervisor and jobbers regularly the wrong work practices followed by weavers and taking their help in making improvements.

7.3. ROLE OF SUPERVISORS AND JOBBERS

Without the co-operation of production personnels, a training officer alone cannot fulfil the function of developing correct work methods. Thus the role of supervisors and jobbers also becomes important in this respects. For fulfilling this purpose they should do the following.

1. Have through knowledgo of correct work methods which should be learnt or verified from the training personnels.

2. Regularly study the work methods practised by weavers and prepare a list of ther who need to be improved in what work method.

3. Encourgenig weavers to improve work mehtods for not scolding for practsing wrong methods.

4. They should be vigilant also about themselves for following correct work methods, otherwise weavers will not take them seriously.

8.Ø RESULTS OF TRAINING IN WORK METHODS.

In an attempt to see the effect of training, data on efficiency and work habits were collected from two mills of 52 pairs of selected weavers werking on 4 loom system. The study showed that before the training the weavers in high efficiency group were singificantly efficiency group, some of the work methods in which they differed significantly were the following.

1. **Way of starting the job at beginning of a shift.**
2. **Number and types of movements economical or un-economical.**
3. **Time taken on various work elements productive and non-productive.**

4. Handling of machine interference situations.

After the training, and improvement was been in performance of both group of weavers but of a greater extent in weavers of low efficiency.

In another study 4 weavers who had gone under training, were comparted with weavers of control group who were not given the training. The "work practice score" of the trained weavers was found to be significantly higher than that of the untrained weavers. This indicates that training did have a singnificant impact on weavers work practrices.

In yet another case, such a training had been very helpful in increasing loom allocations to weavers.

9.Ø. ATIRA CAN HELP MILLS TO START FRESHER AND REFRESHER TRAINING.

ARIRA has conducted in past 6-7 years more than 5Ø training courses for freshers as well as refreshers in spinning and weaving. The different packages of these programmes are for .

i) Selection and placement.

ii) Operatives training.

iii) Jobbers training and,

iv) Trainers tranining.

The role of ATIRA in this tranining should, however, be best visualized as facilitator catalyst, rather than as trainer directly, in other words, mills must not inadvertnetly be led to abdicate the responsiblity of training and leave it to an outside agency.

OPERATIVE TRAINING AS A PRODUCTIVITY TOOL.

A FRESH LOOK AT TRAINING

No organization will deny the need and relevance of worker training for its productivity. However, most textile mills in India do not have any systematic training programme for their workers. The discrepancy between what the organizations profess and what they actually do could probably be due to inadequate conviction about the improtance of worker training to productivity. Today the textile mills are engaged in a rat race for increasing their productivity through a variety of methods-all except worker training. They can be compared to the proverbial wood-cutter who wanted to chop off the wood in the minimum possible time, but never bothered to sharpen the blunt edge of his axe.

This paper aims to examine the relevace of worker training for productivity. It proposes to do so through the following steps:

(1) By pointing out logically land through paractical examples the different ways in which worker training contributes to productivity, and

(2) By showing how the absence of a systematic worker training programme is responsible for losses in production in textils mills.

PRODUCRTIVITY IN TEXTILE MILLS

Productivity in any business concern can be defined as the ratio of the output to input. The inputs can be in the form of the cost of men, materials and machines and output can be the value of goods produced. Increase in ; productivity can occur due tothe following methods:

* Reducing the cost of inputs.
* Increasing the quantity and quality of outputs, the inputs, the inputs remaning the same.
* Through a better utilization of the existing resources.

Any attempt at increasing productivity should make use of the above methods singly or in combination. However, the third factor, viz. better utilization of the existing resourees, assumes a lot of importance mainly because it is more controllable and offer many actions potentials for the management. The existing resources affecting productivity in textile mills can be broadly identified as-

* Technological resources.
* Human resources.

variety of methods like modernization, maintanance etc., whereas human resoures are better utilized through techinques like training and motivation.

WHAT IS WORKER TRAINING?

Worker training is an important personnel function in many enterprises. Proper selection the availability of persons with the right kind of abilities and aptitudes for the job, but making them work effectively is a different thing. For this they should know the right work methods and practices and have right attitudes and orientation.

Worker training is a process of improveing the workers, skills, knowledge, attitudes and behaviour through the instructions, demonstration and other educational techniques. This training refers to any organized effort at attitudinal and behavioural change and not just skill-training.This training attempts to bridge the gap between the hob requirements and the capacity of the person executing the job.

TRAINING INPUTS AND METHODOLOGY

There are three basic types of inputs: skill, attitudes and knowledge. Training activities in an industurial organization are aimed at making desired modifications in skills, attitudes and knowledge of employees so that they perform their jobs most effectively.

SKILLS

Worker training activity in textiles encompasses activities ranging from the acquisition of a simple motor skill to a complex proble solving one. Operatives are trained in the classroom as will as on the machines. They are trained to set and tune the machines, carry out minor repairs, handle and interference situation, diagonise the mechine faults etc. This helps them to be effective on the job.

In this process, workers develop attitudes which are conductive to giving better productivity and less wastage and damage.

ATTITUDES

The training also attempts to develop in the workers attitudes towards work, supervisors, management and industry which are favourable towards the achievement cf individual and organizational goals. Desirable attitudes contribute to maintining good industrial relations.

KNOWLEDGE

Through lecture and demonstration, worker is provided information specific to his job and related broadly to plant, machinery, material, product and quality and standard of product. This knowledge increases the worker's ability to diagonise and solve problems, prevent accidents and reduce wastage and damage. The major outcomes of training are listed below:

* It stimulates, encourages and aids employee's self development.

* It brings an employees performance up to required standards of production and quality by providing adequate information, broadening employees abilities, developing skill and inproving employees attitudes.

* It develops essential abilities and skills to use new or imporved methods, processes of operations, materials and machines.

* It prepares employees for greater responsibilities and for the performance of higher skills and for maximum utilization of abilities.

* It reduces accidents and injuries and minimizes losses resulting from breakage, spoilage and waste.

* It shortens the learning time amongst the new operatives.

* It increases verstility in new operatives and reduces labout turnover.

* It also creates a reservoir of trained employees who are qualified to advance more responsible positions, as and when vacencies occur.

SOME ASSUMPTIONS ABOUT TRAINING

People hold various assumption about what training is. Rolf D.Lynton and Udat pareek 1967 (1) have given a lot of assumptions underlying the prevailing and new concepts of training.

The Prevailing Concept

(1) The acquistion of subject matter knowledge by a participant leads to action.

(2) The participant learns what the trainer teaches. Learning is the simple function of the capacity of the participant to learn and the ability of the trainer to teach.

(3) Individual action leads to improvement on the job.

(4) Training is the responsibility of the training institutions. It begins and ends with the course.

RELEVANCE OF WORKER TRAINING TO PRODUCTIVITY

It has been shown that the training process imparts some new manipulative skill, techical knowledge, problem solving ability, desirable attitueds ect. to the workers. Therefore training should help productivity in the following ways:

* Since training improves work practices, a trained worker takes less time journal of the textile Association - May 1985.

than his untrained counterpart in carrying out various operations. Therefore, the trained weaver can, theoretically, do a higher quantum of work in a give time than his intrained counterpart.

* Rapid technological changes in textile operations create new jobs which require higher skill and eliminate old ones. The skill requirements of the new jobs may be developed in the old workers only by giving them necessary training.

It has been shown that on an average the present efficiency in non-auto loomshed can be increased by 5 to 12%. An average mill employing 7ØØ weavers on non-automatic looms stands to increase its annual profits by at least Rs. 18 lakhs when the performance of all poor performing weavers is improved to increase the average efficiency by about 3%.

The levels of productivity in textiles in India are considerably lower than the international standards. Even in India, there are wide inter-mill differences in productivity levels. In this situation, there is need to improve the capabilities of the operator and make him more versatile and capable of handling a wide range of operations. A training programme can undertake this responsibility and create a culture in the mills where better traditions will be passed down to succeesors.

These observations suggest that a systematic training programme for the workers would go a long way in improving their productivity.

THE NEW CONCEPT:

(1) Motivation and skill lead to action skills are acquired through practice.

(2) Learning in a complete function of motivation and capacity of the individual participant, the norms of the tranining group, the tranining methods and the behaviour of the trainers and the general climate of the institutions. The participants motivation is influenced by the climate of his work organization.

(3) Improvement on the job is a complex function of individual learing, the norms of the working group and the general climate of the organization. Individual learing if unused, leads to frustration.

(4) Training is the responaibility of three partners: the participant's organization; the participant and a training institution. It has a preparatory pretraining and a subsequent post training phase. All are of key importance to the success of training..

QUANTITATIVE ASSESSMENT

The foregoing discussion shows that systematic training for weavers is very desirible. This desirability will become a need if, and only if, the weaver training pays for itself. It will, therefore, be interesting to examine the contribution that systematic training of weavers can make to the improvement of locmshed efficiency and hence to the profitability of a mill. These figures are based on an analysis of data from technological surveys of weaving departments conducted by ATIRA in over 40 mills. The excess loss in efficiency because of loom stoppages in each case has been calculated by first finding out from snap studies the actual loss and then subtracting from this the loss that was expected for the observed loom performance (i.e.incident of warp breaket well wreaks, me and of saiting knowing of beams) and considering satisfactory timings and methods of carrying out the operations. It can be seen from table 1 that excess loss in efficiency due to causes 1,2,3, and partly 6 are mainly because of weavers and 4 and 5 and partly 6 are mainly because of jobbers.

The excess loss due to interference indicates that the work practices followed by weavers are improper, that is, the weavers are not habituated to giving priority in the right sequence for attending to looms when more than one of them are stopped.

Excess loss in efficiency due to weavers being away and due to long time taken in beam changes and in repairs is often due to the work habts and the culture prevailing in a mill.

The above discussion and the data in Table 1 show that there is a substantial scope for increasing loomshed efficiency through proper selection and training of weavers and jobbers. On an average the percentage of efficiency in non-auto loomshed can be increased by at least 3% and in some specific cases by as much as 10 to 12%.

WHAT HAPPENS TODAY IN INDIAN TEXTILE MILLS.

Having seen the ways in which a systematic training programme contributes to productivity, let us see the kind of training which exists in most Indian mills today.

There is no systemstic worker training programme in most textile mills in India today. Historically, the children and near relations of those working in the departments have been allowed entry in to the department. Many of them use this opportunity to learn to operate the machines by watching others and occasionally trying to run them without the mills having to pay them anythng. In due course, these people are given Badli passes, and absorbed as and when the need for a substitute worker arises.

The unsystematic trining affects productivity in many ways. It takes a very long time for a person to learn the vocation and in most cases he doesnt get to learn the "best"way of doing the job till his retirement.

For example, a weaver is not likely to learn the 'best' way of handling a machine interference situation,making weaver's knot, carrying out minor repairs etc., without systematic training. Today, in most situations, the new workers accept some experienced workers as their 'gurus' or 'trainers'. When these experienced workers themselves do not know the 'best' work practices,the fresh workers also cannot learn these from them. Apart from this, in many cases,

the experienced workers hold work attitudes which are not conductive to the attainment of organizational objectives and such attitudes are transferred to the new workers. Thus, the absence of a systematic training programme affects the productivity in two important ways:

I) Loss in productivity due to deficiencies in knowledge, skills and attitudes of the existing workforce.

II) Since the period of learning of the new workers is too long and the learning is largely through trial and error, there is a considerable loss in productivity during this period.

WORKER TRAINING IN TEXTILES SOME EXPERIENCE.

The author has been associated with worker training programmes in various textile mill in India for over 12 years. In this period the author has also become familiar with the experiences of mills conducting systematic training programmes for their worker. For example, on mills has been running a worker training centre since 1956, which imparts training to the workers of all the major operative positions. Whenever the mill wants to introduce more sophisticated machine the existing workers are trained to work on the new machines before they are put on them. The mill techincians claim that this has paid off in terms of better productivity, i.e. the gap between the actual and the achievable efficiency levels is very narrow in their mill. The trained weavers group gives an efficiency of 2 to 5% more than the untrained group. The author knows four other mills in Ahmedabad which are said to be benefiting from their training programmes.

ATIRA EXPERIENCE.

The Human Resources Division in ATIRA has been engaged in conducting worker training programmes and studying their effects on productivity in varous mills in India. So far there have been mainly two types of training programmes.

1) Fresher training programme and

2) Refresher training programme

Fresher training is imparted to new entrants to the jobs and refresher training programme to existing workers who have not had an earlier opportunity to undergo any type of systematic training. Workers belonging to the major operative positions have been covered in the training programmes.

In recent times,the emphasis in operative tarining from ATIRA has shifted to helping mill help themselves. Direct training of operative is not undertaken as an assignment. Instead the organization of mill's internal training function is aided through (a) trainer training programmes and (b) organizational consultancy.

The foregoing discussion highlights the role of training in improving the productivity and profitability of mill. An attempt has been made to show that the textile industry need worker training both for increasing the overall capability and versatility of the workers and for increasing their productivity. The paper has attempted to substantiate this through the results gained from the actual experience of trainig programmes. However, the training programme pays for itself only whenthe organization management is convinced about the need and utility of training and is committed to having a systematic training programme.

Training of weavers and jobbers in the loomshed is essential for improving the profitablility of a mill: an average mill employing about 700 weavers per day can increase its annual profitability by about Rs. 23.5 lakh after training of all weavers. Besldes substantial financial gains, training of operatives will also improve employer-relations and reduce grievances, leading to better understanding of the company objectve and creating and environment where better trradtions will lbe passed down to the successors. Similarly training maintenance staff of spinning department is

very important for quality profit ability. Other critical operations where worker training has a direct impact on preductivity quality and therefore profitablity are also known.

REFERENCES

1) Lynton, Rolf D. and Pareak Udai "What is training chapoor. I in the been "Training for development". Richard D.Irvin (June 1937),6.

(2) Paliwal M.C.Shrivastaca P.K. Naik D.G.Schegal R.N.Kanohi P.D.Patel M.D.Patel D.N.and Shah S.E."Trainingof weaver and Jobber for Better Productivit" Modernisation and Productivity in Textile Industry" Papers read at the 39th AI Textile Conference, Oct. 1982.PP.176-77.