

Training and Development
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Module - 04
Lecture - 20
Theories of Transfer of Training

Welcome to lecture 20, this is the last lecture of this particular module. In previous lecture we discussed about transfer of factors affecting transfer of training and now in this lecture we are going to discuss about Theories of Transfer of Training. Why? Because as we already understand the transfer of training is very critical as when a company spends their resources in training programme, they expect that whatever been trained for the employees that employee has to go back and use it in their workplace.

To ensure that, yes the effective transfer of training is taking place we already learned about what are the factors, now we need to understand and learn theories behind the transfer of training.

So, that this will help an organization member in an organization or who is responsible people who are going to be engaged in planning the training programme or designing the training programme, we will have a better understanding about ok what ways I should create or develop a training programme design a training programme such a way that it will have a more impact on the transfer through a transfer of training in the workplaces.

Meaning that, we are interested in ensuring through training programme I want my employees learn something new, improve something what they already have and come back and use it effectively. So, we are going to learn theories which going to give insight to see how do you take those insight and develop a better training programme ok.

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Introduction

Transfer of training more likely when the trainees work on tasks during training that are very similar, if not identical to the work environment. Transfer of training is more difficult when tasks during training are different from the work environment, i.e., far transfer. There are three theories of transfer of training which have implication on training design.

Diagram illustrating the relationship between Training Environment (T.E.) and Work Environment (W.E.).

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So, when we talk about a training programme, transfer of training where the transfer of training is more likely to occur when trainees work on a task during the training period which are very similar or if not very identical to the work environment.

For example, let us say this is the training environment, which called I say T E ok. So, let us say this is I am just giving you know pictorial depiction. Now so which is very similar to this is my work environment W E ok which I refer to work environment. So, my work environment is also very diagrammatically I am representing ok.

So, which are more identical or very similar in nature, when such situations are there when trainees, this is the training environment, this is the work environment if there are very similar in nature if you look at you know these are all very similar you know I am diagrammatically showing, when they are very similar you are going to see there are high level of transfer of training is going to happen.

But the transfer of training is more difficult, the transfer of training will be lower even lower or may be very difficult to achieve if the task during the training is different from the work environment so, we call it as a far transfer.

So, the likelihood of transfer of training to occur is very less compared to a training programme, which have a very similar or a very close replication of the work environment, not necessarily the physical situations we are talking about you know

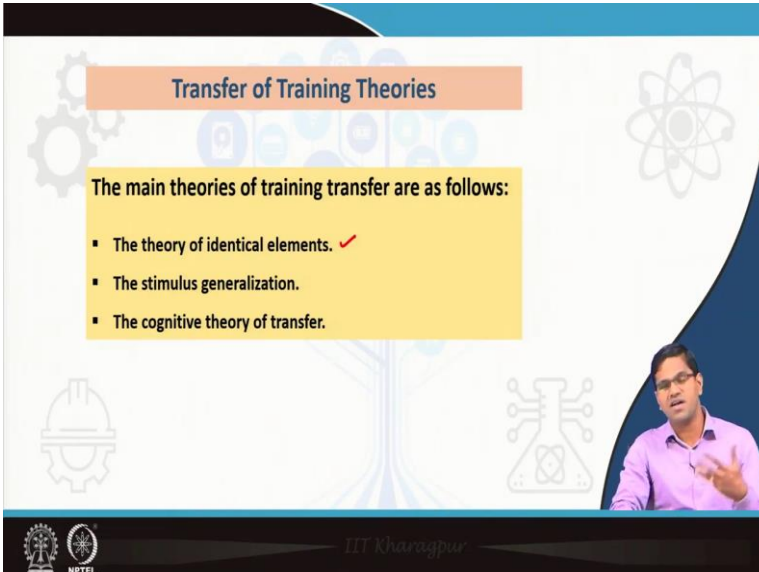
scenarios the scenarios they face, or the situations they encounter, or the problems they face or probably some incidences in a workplace, which are very similar what do they experience in a workplace is all and also replicated in the training programme. Then you will see that my employees who are trained in such situations will show higher level of learning and transfer in their workplace vice-versa that you know situations where which are not identical at all, the employees are never faced a situation which in their workplace, but that has been discussed in the training programme.

So, what will happen the connection or the reflection to connect what they are teaching in a training programme vice-versa what they are experience in the workplace. So, it will have a lot of implications.

So, now it is that is why it is very important, that you know we are going to learn three important theories which is going to talk about transfer of training, which will definitely have implication on how do I design my training programme so that the training transfer of training takes place which is one of the core agenda of any training programme, I want the transfer of training to occur.

So, these theories will provide an insight to design your training. So, that you are ensuring the transfer of training will take place in the workplace ok.

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The slide is titled "Transfer of Training Theories" and lists the main theories of training transfer. It features a yellow box with a list of three theories, the first of which is marked with a red checkmark. The slide also includes a small video inset of a man in a purple shirt and various icons like gears, a hard hat, and a circuit board. Logos for IIT Kharagpur and NPTEL are visible at the bottom.

Transfer of Training Theories

The main theories of training transfer are as follows:

- The theory of identical elements. ✓
- The stimulus generalization.
- The cognitive theory of transfer.

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So, what are those theories? Three the first theory is theory of identical elements and second theory is the stimulus generalization and third one is of a cognitive theory of transfer. So, we are going to discuss all these theory in detail and we will also see how this theory will be connected towards a training design ok.

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Transfer of Training Theories

The table below shows the primary emphasis, conditions that is the most appropriate to consider and types of transfer of each transfer of training theory.

Theory	Emphasis	Appropriate conditions	Type of transfer
Identical Elements	Training environment is identical to work environment	Training focuses on closed skills. ✓ Work environment features are predictable and stable ✓	Near ✓

Challenge/Problem

A
B
C
D

So, when you talk about train you know theory of identical elements. So, the below table will provide that you know primary emphasise and condition which is most appropriate to consider and type of transfer of training in the situations ok.

Let us say this theory is an identical element theory what is it actually says what is their emphasis of this particular theory which says the training environment which we refer to T E. So, training environment should be identical to the work environment, the meaning that very similar or maybe a replica of your work environment.

If so, that is what this theory says if you are able to create an identical elements can be a situation, can be an instances, can be a compliance, can be some problems all that if you can bring it part of the training programme, and it will be it will have a very near transfer of training, which will mean that more likelihood that you know employees will translate their learning in their workplace.

So, what are the appropriate conditions? Training focus on a closed skills. So, what we are we are referring to the closed skills? Let us say the training which are you know

identical to the work environment let us say we are talking about a problem problems or issues they face during the, their work places ok when they perform a particular work role these are the most occurring challenges.

So, the condition which says you have to have a very closed skill you know promoting or developing a skill, which will address these are the challenge or a problem ok the problem in a workplace A B C D.

So, now you should have a very close skill which are will improve or address these problems or a challenge in the workplace and work environment features are predictable and stable. So, that you know my employees will be able to connect that yes the training environment and my work environment is very similar, what are they discussing is that I also encounter in my workplace. When I say I encounter this problem and you know they will pay attention and they try to learn ok how I can improve my situations.

So, that you know my performance improved and I will have a better rating from my supervisors my organization is also will be get benefited if I have a better performances I do not repeat the problem or I do not fail during those challenging times.

So, the transfer of training is near, why do we call near? Because these are very identical they will be able to go back and use it immediately, because which is whatever been trained is very identical very similar to the work environment ok.

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Transfer of Training Theories			
Theory	Emphasis	Appropriate conditions	Type of transfer
Stimulus Generalization	General principles are applicable to many different work situations	Training focuses on <u>open skills</u> . Work environment is unpredictable and highly variable	"Far"
Cognitive Theory	Meaningful materials coding schemes enhance <u>storage</u> and recall of training content	All types of training and environment	Near and far

Handwritten notes:
 → "Naghi ahan"
 → "Naghi ahan & jachin"
 → "Cu in room / client"
 → "Business Deal"

Now, we are talking about the second theory, which is the stimulus generalization. What does this theory say? This theory emphasis on general principles is applicable to many different work situations it is not very similar to what we discussed about on identical elements, where they are talking about a very general skill set, which may be useful in very many different work situations. It not essentially to whatever each of the employees or a participants going to go through, it you are focusing on more generalized skill sets.

For example, this will focus on training focus on open skills let us say conflict management skill or interpersonal skill or maybe it is will be focusing on leadership skills or it may be focusing on a negotiations, which are very open skills it they may not be negotiating every day, they may not be you know handling conflict every day maybe some organization yes possible, but not always.

And leadership it is not always applicable to everybody, these are all open skills or interpersonal skills we are talking about these are all very open skills in here the one work environment is unpredictable and highly variable. In this situations, let us say the training programme focused on this what type of a transfer of training it is a very far transfer of training.

What why do we refer to this is a far? Because this training which are focuses on a skill which is not may not be related immediately, because they might use it in a different situations or may be even when they moved in a different role altogether they may use it or maybe as and when they experience such situations only they will be able to use it. So that is why this transfer of training in according to these theories it is a far transfer of training.

Because let us say I am talking about a negotiation which is a skill ok, now I am providing a training programme for a bunch of my employees on the negotiation skill how do you negotiate effectively with or you know with the clients or a customers or during the business deal at all.

So, then of the after this negotiations training is over, and they go back to the workplace are you going to see that you know they are going to effectively use all these negotiation skill immediately when they go back to the workplace not necessarily it cannot happen, it will happen only when the participant who participated in the negotiation skill training programme if they go for a negotiation situations.

If there is a situation occurs negotiation situations, wherein let us say they are participating in a negotiation with a customer or a client or they are trying to engage in a business deal, that time they will be able to use effectively whatever they learnt.

Meaning that, the transfer training is not immediate immediately when they go back they cannot use that in their workplace rather as and when the situation arises then they will be able to use it ok.

Now, comes the last theory which is the cognitive theory. So, what is the emphasis of this particular theory. This emphasise on meaningful material coding schemes enhances the individuals you know storage and recall of a training content, its mostly focused on cognitive ability of the individual how effectively the employees can store the information and they can recall the information as and when it is required.

It is also focusing on the comprehensive ability and understanding the concept being taught in the training programme and you know store that information and when they require they will be use it.

It you know it's all type of training and environment. So, this can be both near and far transfer can possible because the information, which are discussed in a training may be used immediately in the work places or may be as and when there is a requirement then they might be able to recollect and retain their learning and use it in the workplace.

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Transfer of Training Theories

The Theory of Identical Elements:

The theory proposes that transfer of training occurs when what is being learnt in the training session is identical to what the trainees have to perform on the job.

Transfer will be maximized to the degree that the tasks, materials, equipment and other characteristics of learning environment are similar to those encountered in the work environment.

T.E.W.E

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So, we will you know look into in a detail and a perspective of all these theory. The first theory which we are referring to is yes theory of identical elements with this theory proposes that yes a transfer of training is going to be higher when what is being learnt in a training session is identical to what trainees have to perform on the job. This is the key. When this T E and W E are more or less similar and there is a high transfer of training.

The transfer will be maximized to the degree the task materials or equipment and other characters of the learning environmental are very similar to those encoded in the work environment.

For example, when you are conducting a training programme you are using a similar machineries or a similar tool or a similar technology or a software any tool technology or whatever we use, which is very similar to work environment then it is going to be even higher transfer.

Because they will feel that this is what I am doing in my workplace I am using it ok. So, for example, induction training programme, where induction training programme effectively they are training a new employees; new bunch of employees who is trained on it and then they go back and perform the same role same job. So, that is why the transfer of training will be very higher in induction training programme

Because so, where you know the replication of the work situation to the tool or technology or a software or a platform whatever they are using where they are going to use in the workplace will be they will be trained on that. So, the transfer of training will be very higher ok.

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The slide is titled "Transfer of Training Theories". It features a yellow box with the following text:

Application of the Theory of Identical Elements

The theory has been applied to many training programmes particularly those who deal with the use of equipment or that involve specific procedures that must be learned. This theory is particularly relevant in making sure that near transfer is occurred. Near transfer refers to trainees' ability to apply learned capabilities exactly to the work situation.

This theory does not encourage transfer where the learning environment and the training environment are not necessarily identical.

Handwritten notes in a red box on the right side of the slide list the following examples:

- ✓ Machines
- ✓ Tool
- ✓ Technology
- ✓ Software

The slide also includes the NPTEL logo and the text "IIT Kharagpur" at the bottom.

So, what are the application of this theory of you know identical elements? The theory has applied in many training programmes particularly, when we use equipment train I want to train somebody on how to use the machinery or how to use the tool how to use a particular software or a technology. So, then in that situations, this has more relevance because the transfer occurs immediately with the ability to learn the capabilities exactly to the work situation is higher so, where this theory is applied.

So, when you wanted to design a training programme apply this theory when you feel like you know my employee should be trained on you know machineries, machines or tool or a technology ok, or let us say software all that when we want to focus use this theory of you know identical elements and you expose the employees to a very similar situations then the transfer of training will be you know much higher and you know will have a better output of the training programme.

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The slide is titled "Transfer of Training Theories" and focuses on the "Application of the Theory of Identical Elements". It features a diagram where "Learning to Learn" is at the top, branching into "Rote memory" and "Problem solving". "Rote memory" has a red checkmark. "Problem solving" has a red checkmark and leads to three outcomes: "Ability to learn" (with a red checkmark), "Practices of similar tasks" (underlined in red), and "Solution of problems" (underlined in red). A red double-headed arrow is on the right side of the diagram. The slide also includes the NPTEL logo and the name "LT Khuragpur" at the bottom.

So, application if you look at you know see they are able to learn what they are wanted to do it in the workplace, and they are also practice of a very similar task which they will experience in the workplace, they will also see what are the solutions to the problem which I see, am I going to learn the problem solving, am I going to have a remote rote memory, where I will be able to store the information use it in the workplace.

So, this theory of identical elements which is talking about yes, I am going to learn in a very similar task and also I learn what are the problem and challenges can occur in the workplace and I am trying to understand the solution for the problem. So, that I can go back to my workplace and use the same thing which I learnt in a training programme ok.

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The slide is titled "Transfer of Training Theories" in an orange header. Below the header, a yellow box contains the following text:

Stimulus Generalization Approach

This theory emphasizes far transfer. Far transfer refers to the trainees' ability to apply learned capabilities to the work environment, even though the work environment is not identical to that of the training session.

This approach can be seen in the design of some skill training programmes, which are based on social learning theory.

The slide also features a small video inset of a man in a purple shirt speaking, and logos for IIT Kharagpur and NPTEL at the bottom.

Now, comes the second theory which is a stimulus generalization approach. This theory which is talking about a far transfer, as I already said why we say far transfer because the transfer is not going to be immediate, this will occur only when those trained skills are at you know some tool or knowledge, which may be useful in a later situations.

So, the transfer refers to trainees' ability to apply learned capabilities to the work environment, even though work environment may be may not be identical to that of a training programme. Let us say you are training them on some skill set, which may not be you know very similar the training situations or a training environment may not be very similar or not even identical to the work place, but it refers to the yes whether my trainees are able to use it even in an un-identical situations when they use it.

So, this approach can be seen and design of some skill training programme because we are talking about skill training programmes, which are based on social learning theory when we are talking about a social learning theory, which talks about forced processes attention retention motor reproduction and the behavioural reinforcement.

So, this type of a training programme will have more applications when you use this theory which talks about learning them in a non-identical situations as we talk about a skill-based training programmes you provide.

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The slide features a blue header with the title "Transfer of Training Theories". Below the title is a yellow box with the following text:

Application of Stimulus Generalization Approach

This theory emphasizes on **key behaviours** that can be used successfully in a wide variety of situations. The model demonstrates these key behaviours in a video, and trainees have opportunities to practice them.

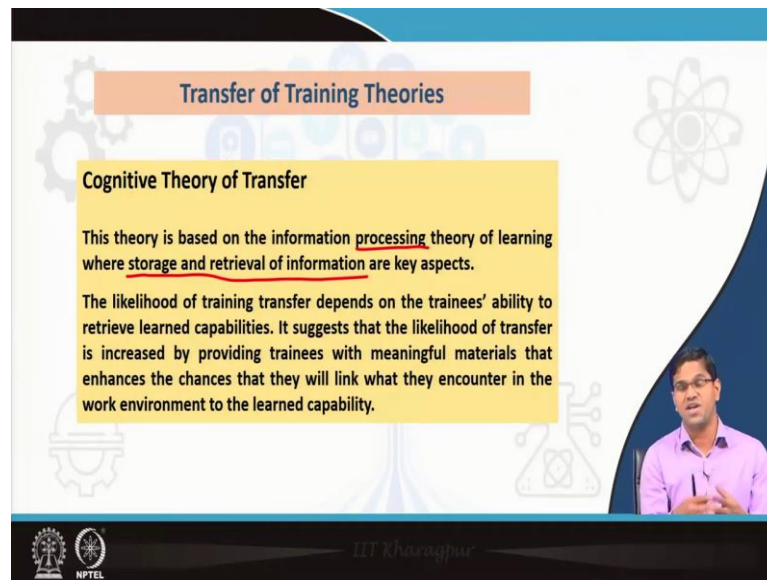
In developing effective interpersonal skill training programme, is to identify key behaviours that are needed to be successful in a situation.

The slide also includes a small inset video of a man in a purple shirt speaking, and logos for IIT Kharagpur and NPTEL at the bottom.

And you know what are the application of this particular approaches. So, the theory emphasis on behaviours more on you know, certain behaviours which you talking about maybe in an interpersonal. So, this can be used in wide variety of situations the model demonstrates there are these are the behaviours through the video or a trainee have an opportunity to practice them and maybe you know it also focus on interpersonal skill training programme so, that they identify ok.

So, how I will be you know very effectively communicate with my peers or my you know customers, clients I will have a better communication skill, I can handle the team, team management and also you know conflict management, power tactics using the power tactics in the workplaces or impression management, these are all the you know interpersonal skills through you know this kind of theory can be applied wherein the employee is able to learn by observing the similar behaviour pattern, which will be will have a higher probability of having a better workplace performances ok.

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Transfer of Training Theories

Cognitive Theory of Transfer

This theory is based on the information processing theory of learning where storage and retrieval of information are key aspects.

The likelihood of training transfer depends on the trainees' ability to retrieve learned capabilities. It suggests that the likelihood of transfer is increased by providing trainees with meaningful materials that enhances the chances that they will link what they encounter in the work environment to the learned capability.

Dr. Khanna

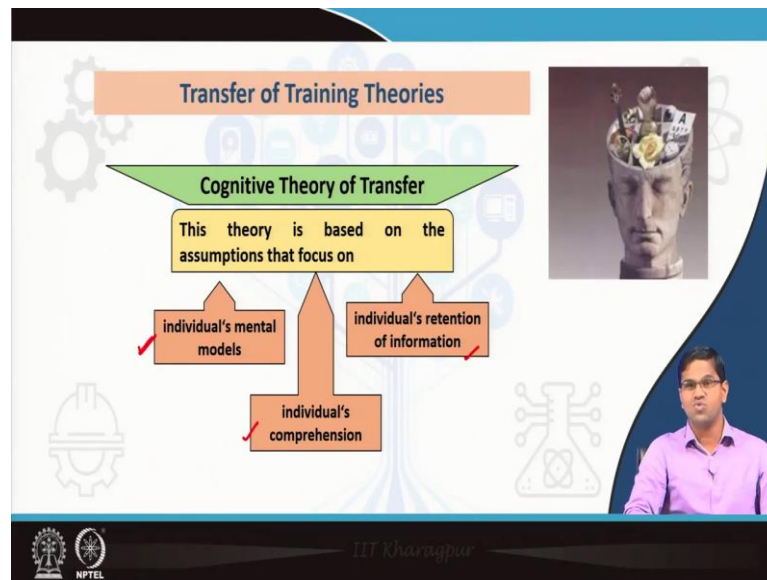
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Then comes the last theory which is about the cognitive theory of transfer this theory is based on information processing theory of learning where storage and retrieval of information are a key aspects. So, this theory essentially focusses on two important things. So, it is about the storage of the information and retrieval of the information.

So, this likelihood of transfer of training depends on heavily depends on trainees' ability to retrieve the learned capabilities, whether my trainee have a better cognitive ability to retrieve whatever they learnt, are they able to store and retain those information you know it suggests that you know likelihood of transfer is increased by providing trainees with a meaningful materials that can enhance that they will link what they encounter in the work environment to the learned capability.

So, you will be very successful if a training programme can provide materials or manuals, which will be you know handier for them to learn and connect and link in what situations I can use it in my workplaces, it will increase more likelihood of transfer of training to take place.

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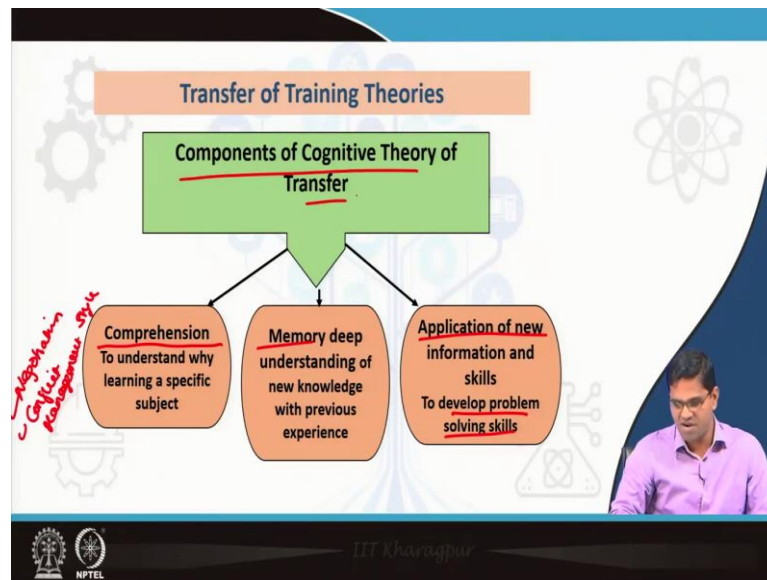


So, when we talk about this cognitive theory of transfer what is it actually focusing on this based on key assumption. There are three key assumptions this theory is talking about one is about individual's mental model. So, how may you know individual as an employee will have a mental model about the workplace situations may they assume ok how I approach these situations if it occurs in my workplace.

And individuals' comprehensions are they able to understand comprehend in a better way and individuals' retention of information, then comes ok I understand comprehend then it's also about individuals' retention of information am I able to recollect or you know use the stored information or you know retain the information, which are stored in myself these are the three assumption this cognitive theory of transfer which talks about.

So, it focuses on individuals' mental model how each individual will relate to these situations or a work situations or a work environment and how good they are able to understand comprehend the skills being taught during the training programme and how likely that individual is able to retain the information, can they retain the information through whatever they learn during the training programme.

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So, the components of this cognitive theory of transfer which focuses on comprehension, which is to understand why learning a specific subject is important and what is this relevance, how I will be able to you know understand for example, I talk about a negotiation or I talk about a conflict management style ok, conflict management style.

So, now I should understand learning the specific approaches in handling the situations then a memory deep where we are talking about understanding of a new knowledge with the previous experience, how I am going to you know understand the new knowledge which is the new information, which I am learning with my previous experiences connecting with my previous experiences and comes the application of you know new information and skills.

So, how I am going to use which I you know learnt new which are a skill maybe an information to develop a problem-solving skills in the workplaces. So, the cognitive theory of transfer which you know heavily depends on individuals' ability where it's a cognitive, if you connect with the factors affecting the transfer of training the training characteristics which are talking about a cognitive ability right.

The cognitive ability, which depends on individuals' ability to comprehend the information, store the information and retain and relate with those current you know different work context and then see can I use this information skills in to develop a

problem-solving skills in a workplaces as these are the some of the component's key components of transfer of training.

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Transfer of Training Theories

Application of Cognitive Theory of Transfer

The influence of this theory is seen in training design that encourages trainees, as part of the programme to consider potential applications of the training content to their jobs.

Many training programmes include a work problem or situation identified by trainees and discuss the potential application of training content.

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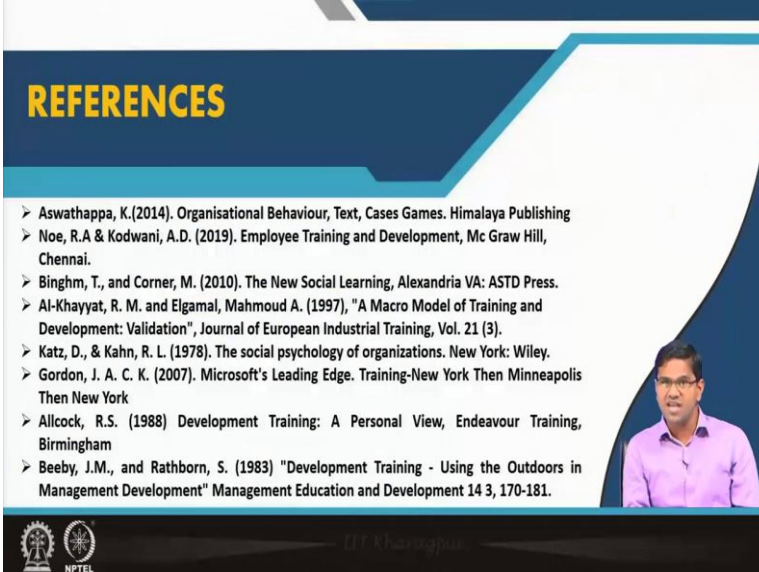
Now, what are the applications? The influence of the theory is seen in training design that encourages trainee as a part of programme to consider potential applications of training content to their jobs you know many training programmes, which will include work problem or a situations identified by the trainees and discuss the potential application of the training content.

So, they always go with you know understanding ok, what are the you know they discuss with the participants about ok, what are the different problems you will encounter can we see, can we apply this conflict style in those situations, have you experienced any challenging or a conflicts within your team members between your peers, between your co workers, can we apply this model in a workplace, how do you apply this model in a workplaces and also you know discuss the potential application of the training content to the similar situations they were experience.

For example, negotiation let us say we are going for a business deal with a potential client now we have discussed on some of the strategies of negotiations can we relate this to the situations, how do you use the situations. In this way the employees will be able to or the trainees will be able to relate those information and what do they do when they relate they will also store the information with them.

So, yes this is how I should use the negotiation strategy when I encounter a situation a or a situation b in a conflict negotiation situations. Now when they go back when there is a situation of a negotiation, thus the strategy will be stored and they will be able to retrieve those information and use the strategy effectively during the negotiation situation. These are some of the applications in I am just trying to bring in and reflect upon, so that you will be able to connect that yes, the transfer of training can occur by the application of theory ok.

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So, these are the references.

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CONCLUSION

This part of lecture session has given clear picture on the theories of training transfer and their application in various job situation and environments. These are very helpful learnings to all learners.

I. Elements

N.E. - I.E. Similarity

Problems

Transfer Training

Near

Far

Performance Deficiency

Poor Operation of Machinery

Error in Usage of Tool

Interpersonal Skills

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Today we learnt about three important theories, one is about theory of identical elements and we also talked about stimulus generalization approach and cognitive the theory which we are essentially what we are talking about is, how do you design your training programme such a way that the transfer of training will take place?

Are you going to be focusing on creating an identical elements similar situation in the work place so that my employees will able to learn and use it immediately. Am I looking at a far or a near transfer. So, this is very important, why because the transfer of training, which we are talking about. Are we interested in creating a near transfer to occur or a far transfer to occur?

So, for example, some interpersonal skills or a leadership you know all that, which we may not immediately see that you know which will be applicable whereas, the near transfer is for example, there is a you know performance deficiency which are related to you know poor operation of a machinery or making error in usage of usage of tool ok.

In this situations, what do I do I should go for near transfer of training because I want to address this programme deficiency. Now in this which theory I can use I should apply identical theory of identical elements, now I need to create a training programme which will have very similar work environment.

So, meaning that you will come up with a training programme which will reflect which will have similar situations or instances or problems which are encountered by the employees. So, if then what will happen the training programme will deliver, how do you come up with the solutions for these specific situations or instances or a problems.

So, you can actually apply this identical element theory where even you will be able to replicate a similar work environment and then you will train the employees on how do you solve these problems how do you address these situations and how what will you do during this instances.

For example, I want to train somebody to use the machinery properly do not you know result in you know any breakdown of the machinery or failure or any error any deviation should not occur. So, what I can do I can actually make my employees to learn ok. How should I operate the machinery? What are the most recurring problems are possible? And how in case if it happens how do you fix it? If you can do this in a training programme.

So, when they go back to the workplace when they operate in a same machine at their workplace they will know ok, what are the possible you know malfunction is possible and they also know how do I fix if the such malfunctioning comes, so that my productivity is not hampered, my productivity is not halted, I continue to have a better performance. That is why the application of theory in what type of a training, you design has lot of implications.

For example, my transfer of training is far we are focusing on you know this stimulus generalization theory, where you would conduct a training programme where it this training programme or the building of the capabilities, where these employees can use it not in a very identical situation where in a different situation also.

For example, some training is been conducted on a conflict management, in a training place where you talked about a conflict between the employee and the customer. Now, but the conflict strategy can be used in a different version.

For example, the employee who had you know gone through the training, may be using this conflict handling strategy when there was a conflict between within the team members or maybe between two teams when there is a conflict they can use it effectively

also. So, when there is a transfer of training may not immediately occur, but when there is a situation arises then employees who underwent the training can use it.

So, this is how the theories are very critical in designing what type of a training programme I should design, what should be my instruction method. So, this theory and transfer of training or the intention of the transfer training has lot of place in ensuring what type of a training design a company has to come up with.

So, in this particular module we learnt about the learning theories, application of the learning theories, transfer of training, how do you make an effective transfer of training to occur in the workplace and also learnt about a theories which provides a basis for a training design. With this you know knowledge we are going to look at the next module which are focusing on training design how a programme design can happen. So, we will look at in the next module on how we will design a training programme.

Thank you.