

# [Chapter 8: motor learning and control](https://assignbuster.com/chapter-8-motor-learning-and-control/)

motor learningconcerned with the interactions of all the body's systemsphysicalstructure ONCHAPTER 8: MOTOR LEARNING AND CONTROL SPECIFICALLY FOR YOUFOR ONLY$13. 90/PAGEOrder Nowphysiologicalfunctionpsychological/mentalcognitive functioningmotor controlbiomechanics
physical components of the skill
without the psychological componentdiscrete movementshave a distinct beginning and a distinct ending (tennis serve, gold swing, shooting a basketball, writing your name)continuous movementshave no distinct ending and cannot be completely preplanned (attempting to catch a parakeet in a cage, tackling in football, guarding an opponent in basketball)closed environmentsrelatively stable such that conditions do not change from moment to moment (bowling)open environmentthe conditions are continually changing (tennis, football, etc.)cognitive stagenot only do we need to learn the gross motor skills, but also what stimuli (sounds, colors, etc.) ignore and which to focus uponassociative stagefocus on refining the skill and being more efficient or accomplishedautonomous stagemuscle memorymotor program (engram)specific learned motor patterns stored in the braininterference theory of memoryproactive interference
retroactive interferenceproactive interferencewhat you do beforeretroactive interferenceaftercontext effects on learningthings that are happening around you
environment
external context
internal contextserial position curvethe first and last items will be remembered best
primacy effect
recency effectjost's lawif two memories are a different age, a new repetition/experience will be more beneficial to the older memorystrength paradoxthe weaker the memory trace the more beneficial a repetition/experience will be to it (the newer the memory the less beneficial)von restorff effectif you can do something that you can make unique you will have the tendency to remember itselective attentionthe ability to focus on relevant information and not focusing on irrelevant informationover exclusive stageages 2 - 6 yearsover inclusive stageages 6 - 9 yearsselective attention9 - 12 yearsspeed-accuracy trade offas we increase the speed with which we do something, we tend to increase the number of errors we makefitt's lawalso known as speed-accuracyhick's lawthe time it takes for a person to make a decision is a function of the possible choices he or she has availableknowledge of resultsto extent to which a response accomplished the intended movement goalknowledge of performanceinformation received about the actual performance and execution of the movementintrinsic feedbackusually gained through sensesextrinsic feedbackinformation gained from external source such as coaches, teachers, special devices (camera, pictures, etc.)