

Pavlov's dogs?

Is our phone an addictive drug?



Pavlov's dogs?

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Ever wonder why our attention-sucking iPhones have an irresistible pull on us? Why it's impossible to ignore our iPhones at the sound of a ding, as it exerts its mind-altering power upon us? **Classical conditioning** is the very reason why we have an immediate response to our iPhones — a type of associative learning, otherwise known as behaviourism. Classical conditioning was first came to prominence through the work of Russian physiologist Ivan Pavlov, who was able to make dogs salivate at the sight and sound of a bell. Which begs the question: Are we just Pavlov's dogs?

In this wired generation, where technology has seemingly taken over our lives, we have the tendency to rely on our smartphones to improve the general quality of life. Have you ever experienced jolting up at the sound of an incoming call or message? Then immediately find yourself reaching out for your phone, even though it wasn't your device that ringed or beeped in the first place? Well this is considered a classic

case of classical conditioning, a.k.a. an **unconditioned stimulus (UCS)**. To break this down in simpler terms, a **stimulus** is a detectable change in an internal or external environment. When two stimuli are paired together, a response is generated. In particularly, an unconditioned stimulus triggers a natural and automatic response. As technologies continue to advance, notifications, incoming calls, messages and alarms, allow consumers to constantly engage with their iPhones daily. Although, it is clear that our cellular devices have a magnetic pull upon us, as it chimes or buzzes, we are simply left unable to avoid staying our phones.

Evolution is a remarkable achievement — we can walk on 2 legs, see with 2 eyes, and in this case have the power to detect a range of stimuli with our ears. To fully understand why we react the way we do towards our iPhones, we must enter the realm of our brains. The **receptor** is a signal in our brain that detects the stimulus to carry a message, which allows us to



respond to noises that surrounds us. When a smartphone produces a vibration or sound, it contains different frequencies and sound waves, causing different responses.

Auditory nerve transmits electrical messages from the ear to the brain, so that sounds can be interpreted. Our ears play a major role in detecting different sound waves and frequencies from our immediate environment. Our lightning flash response to the noises on our phones has transformed our daily lives. Just like Pavlov's dogs we salivate and jump at the targeted ring and vibrations our phones make.

Are we just like Pavlov's dogs? It is made clear that humans of the 21st century are obsessed with their inanimate companions. Classical conditioning and smartphones are a powerful combination, leading humans to disconnect from real life and plug into the world on our phones.

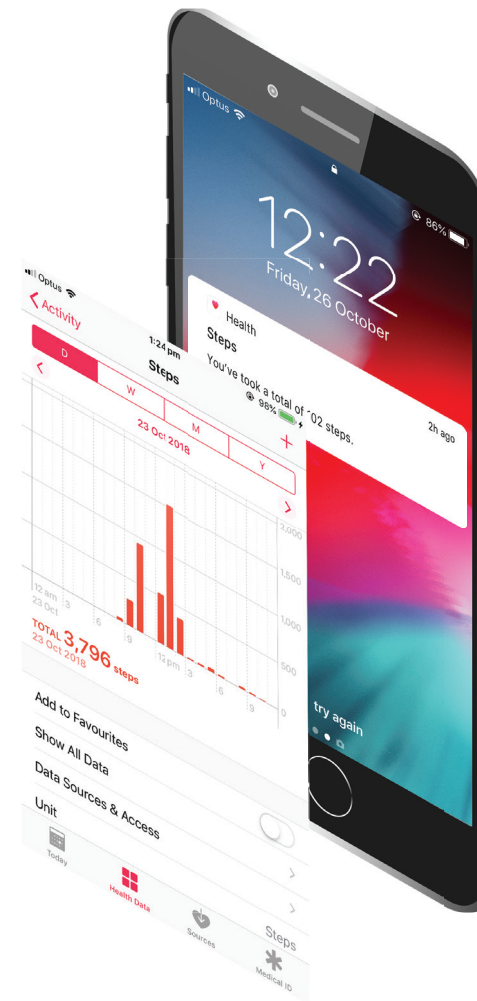
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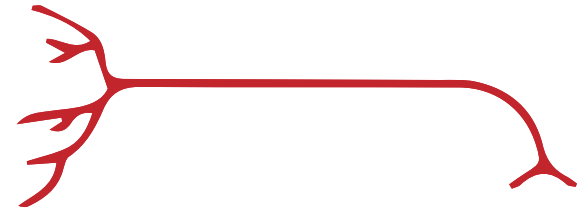
Our interaction with smartphone via sound & How we responded to it



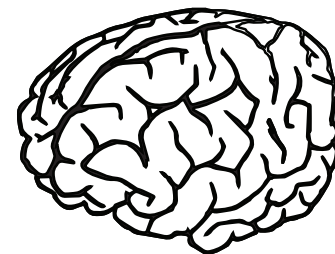
Notification alert and sound effects from iPhone is a **stimulus**.



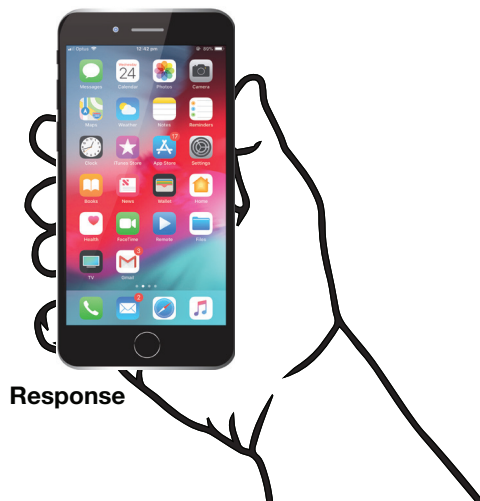
The stimulus is detected by **receptor** in the ear.



Auditory nerve transmit electrical message to the brain in order for sounds to be interpreted.



Our **brain** contain CNS (Central Nervous System) to process the message and allows us to respond to a stimulus.



Response

Effector