Technical Description:

Xbox One controller model 1697

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Content

History Of the Controller

The Xbox One Controller model 1697 was made in 2013 after its predecessor the first generation xbox controller and the xbox 360 controller .The first generation controller and the control itself was bulky. The controller was uncomfortable and gave the sense of over reaching the fingers of the user to press a button. Model 1697 improved on the many parts of the controller. The Impulse triggers Cross shaped d-pad and analog sticks were all improvements into the control as gaming became more immersive. The analog sticks required less force than the previous version which made gaming smooth. Audio was improved on by making communication clearer according to Microsoft ``Clearer than talking on a phone" Also adding a compartment for the batteries avoiding clunkiness as the 360 model had an extended piece to put batteries in. The Controller had been tested with a broad spectrum of age to hopefully gain the attraction of a younger audience and welcome newer gamers. The controller starts at $60 dollars makes it affordable as newer models tend to have advanced settings that are only for personal preferences and not a necessity

Functions of the Main parts

Controllers Specifications: Height:101.9mm Width: 152.9mm Depth:61mm Weight:280.66grams

Front Face: The front protective layer of the controller. Width: 152.9mm Depth:61mm

Rear face: Length: The rear protective layer of the controller Width: 152.9mm Depth:61mm

Left face: The left protective layer of the controller. Used as a grip to the controller on the left side. Length 90mm Width 30mm

Right face: The right protective layer of the controller. Used as a grip to the controller on the right side. Length 90mm Width 30mm

Left and Right joystick: Used to move throughout the an xbox interface Height: 15mm Width:23mm

Left Bumper: Interacts by skipping large portions of the xbox interface. Cycles left Length: 40mm Height: 15mm

Left trigger: Interacts by skipping large portions of the xbox interface. Cycles up Length: 20mm Height: 20mm

Right Bumper: Interacts by skipping large portions of the xbox interface. Cycles right Length: 40mm Height: 15mm

Right trigger:Interacts by skipping large portions of the xbox interface. Cycles up Length: 20mm Height: 20mm

View Button: Gives options to customize the home page. Diameter:7mm

Xbox button: Gives option to turn on/off controller, turn off/reset console activate magnifier and narrator

Menu Button: gives options to customize and access apps. Diameter: 7MM

Directional pad (d-pad): A more rigid set of movement left, right, up, down Length: 20mm Height: 20mm

expansion port:

A B X Y buttons: The A button confirms actions.The B button declines actions or backtracks. The X button is used during gameplay or on the keyboard for erasing characters. The Y button is used for activating the search bar. Diameter:13mm

USB charge port: Allows the controller to be used while plugged

Pair button:

Battery compartment cover: Protects the batteries and the compartment

Sub parts

Impulse triggers right/Impulse triggers left: When triggers are used the items vibrate the entire controller.

5 count 10 mm T8 security torx Screwdriver: The screws are a part of the controller frame and rear face they are held together

Bumper buttons : When the bumpers are pressed the buttons send a signal towards the console

D-pad sensors: Pressing any side of the Directional pad sends a signal towards the console going in the directions accessible.

Trigger sensors: The trigger sensors detect when the triggers are in use and activate the impulse triggers at the same time.

Circuit board case: The circuit board case holds together the entire case

11cm x 4cm circuit board: The circuit board relays all button uses and the electricity travels throughout the entire circuit board.

Wire for triggers: Electricity travels through the wires to sense when the triggers are being used.

Impulse wire trigger: Electricity traveling to the impulse triggers

D- pad ring: Holds the d-pad in place

Joystick sensors: The sensors detect the direction the joystick has gone.

Battery compartment with tongs: The compartment is for the battery that powers the circuit board and the buttons used

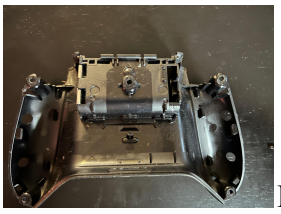
 Figure 1  Figure 2  Figure 3

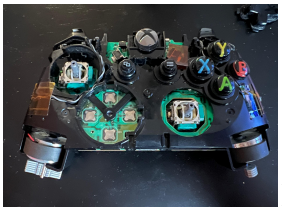
 Figure 4  Figure 5  Figure 6

 Figure 7  Figure 8  Figure 9

Features

The Xbox one Controller Model 1697 has many benefits when in use. The controller by itself can be remapped and can adjust to the user's own liking instead of using the default settings. The impulse triggers do take up a large amount of battery life and can drain the device a lot faster if used rather than without use. The controller makes up for this in 2 ways. The impulse triggers can be activated and deactivated to the user's preference. Another way is if the battery is on low power the control will manually turn off the impulse triggers. Model 1697 doesn't have an audio Jack which does force users to purchase an adapter. The adapter does help the controller in its ability to mix game audio and with communication audio. Because of this the purchase of an adapter is beneficial towards the customer controller. The feature added to this model as well is the low power state. When using the control and you

have to step away for a couple of minutes the control will enter a “low power state” before completely turning off to reserve battery life. The model has the protective faces for each side of the control that can be removed without much effort. The top and sides faces can be pried off. The will take a large amount of effort to damage the exterior of the control making it susceptible to damage. The controller having multiple removable faces gives you the option of cleaning between the cracks and also being able to customize the controller to colors you may enjoy other than stock colors. Many have taken advantage of this by adding designs that you wouldn’t normally be able to get from purchasing. Model 1697 is an amazing controller and truly an innovation. The controller even now has kept the same format for the new models with slight variations. The control is meant to be in the hands of gamers and has improved so much from its original versions. Customization is only limited by oneself and it's affordable for all gamers. If taken care of it will last more than enough till the next generation of consoles come out.

Reference Page

https://news.xbox.com/en-us/2013/06/06/xbox-one-controller-feature/