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DRONE RACING GENESIS

OWNER'S MANUAL

420-0039UK



DRONE RACING GENESIS

OWNER'S MANUAL

IMPORTANT

- Before using this product, read this Manual carefully to understand the contents herein stated
- After reading this Manual, be sure to keep it near the product or in a convenient place for easy reference when necessary

INTRODUCTION

This Manual is intended to provide detailed descriptions together with all necessary information covering the general operation of electronic assemblies, electromechanical, servicing control, spare parts, etc. for the product:

"**DRONE RACING GENESIS**"

This Manual is intended for the owners, personnel managers in charge of operation of this product. Operate the product after carefully reading and sufficiently understanding the instructions.

In the unlikely event that the product does not function correctly, **DO NOT** allow anyone other than a technician to touch the internal system. Turn off the power to the machine, making sure to unplug the electrical cord from the outlet, and contact the office listed below or the point-of-purchase for this product.

Use of this product is unlikely to cause physical injuries or damage to property. However, points that require special attention are indicated by bold text, the words "**STOP**", "**IMPORTANT**" or "**CAUTION**" and the symbols below.



Indicates important information that, if ignored, may result in the mishandling of the product and cause faulty operation or damage to the product



Indicates a warning or caution that, if ignored, may result in the mishandling of the product and cause faulty operation or damage to the product

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Definition of 'Site Maintenance Personnel' or Other Qualified Individuals



Procedures not described in this Manual or marked as 'to be carried out by Site Maintenance Personnel or other qualified professionals' should not be carried out by personnel without the necessary skill or technological experience. Work carried out by unqualified persons may cause serious accidents, including electrocution.

Parts replacement, maintenance inspections and troubleshooting should be carried out by site maintenance personnel or other qualified professionals. This Manual includes directions for potentially dangerous procedures which should only be carried out by professionals with the appropriate specialised knowledge.

The Site Maintenance Personnel or other qualified professionals mentioned in this Manual are defined as follows:

Site Maintenance Personnel:

Individuals with experience in maintaining amusement equipment, vending machines, etc., working under the supervision of the owner/operator of this product to maintain machines within amusement facilities or similar premises by carrying out everyday procedures such as assembly, maintenance inspections, and replacement of units/expendable parts.

Activities to be carried out by Site Maintenance Personnel:

Amusement equipment/vending machine assembly, maintenance inspection and replacement of units/expendable parts.

Other qualified professionals:

Persons employed by amusement equipment manufacturers, or involved in design, production, testing or maintenance of amusement equipment. The individual should have either graduated from technical school or hold similar qualifications in electrical/electronics/mechanical engineering.

Activities to be carried out by other qualified professionals:

Amusement equipment/vending machine assembly, repair/adjustment of electrical/electronic/mechanical parts.

Electrical & Mechanical Specifications

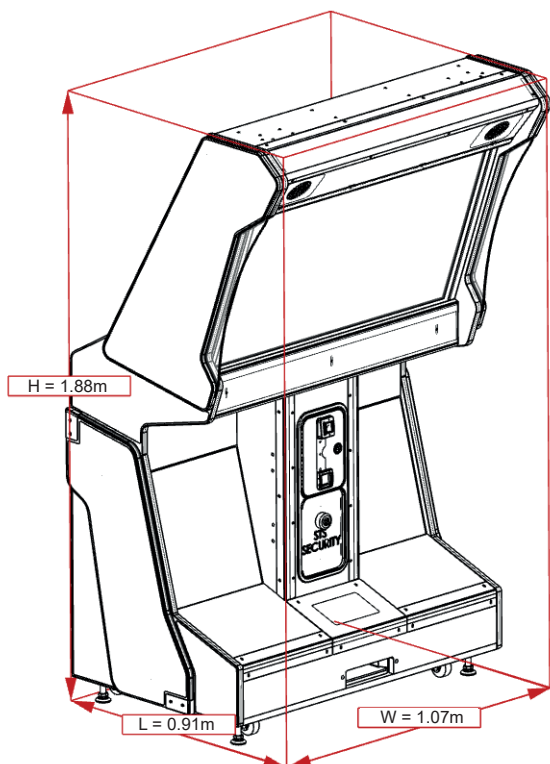
SPECIFICATIONS

Standard Cabinet

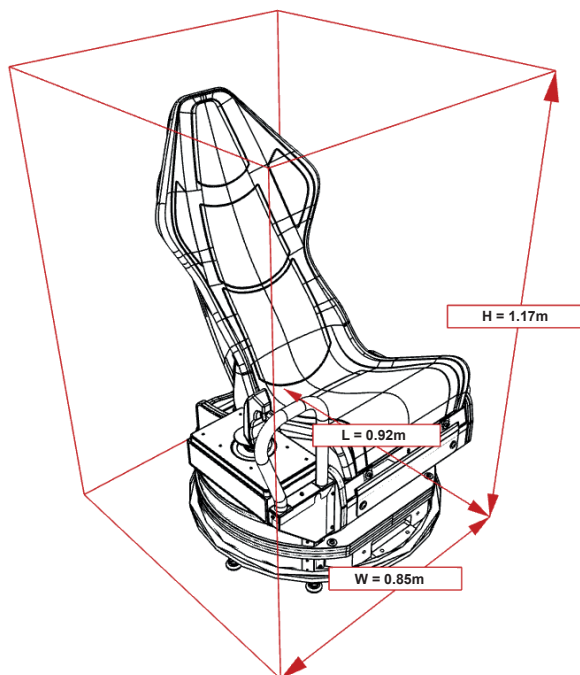
Machine Dimensions:	1.12m (44.1in) [Width] x 1.96m (77.1in) [Depth]
Machine Height:	2.33m (91.7in) (Installed)
Machine Weight:	358kg Approx (Installed)
Power, maximum current:	-350w-
Rating:	115/230VAC @ 50/60Hz
Fuse Rating:	3.15A

INDIVIDUAL SPECIFICATIONS

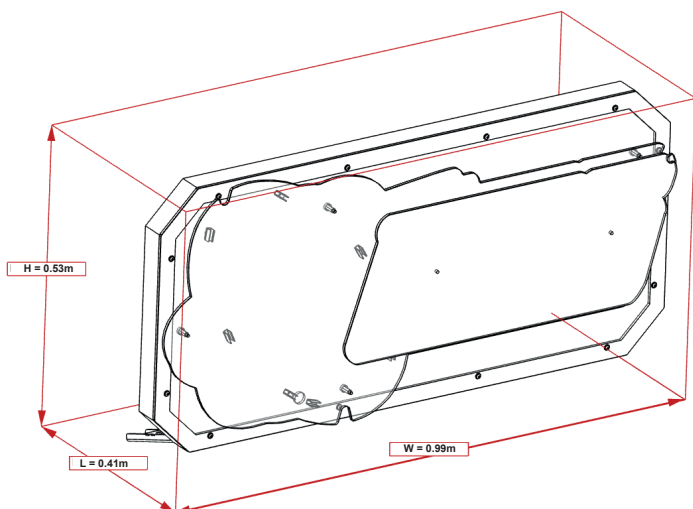
Monitor Cabinet



Seat Cabinet



Billboard



Waste of Electrical and Electronic Equipment (WEEE) Statement

The WEEE (Waste of Electrical and Electronic Equipment) directive places an obligation on all EU based manufacturers and importers of Electrical and Electronic Equipment (EEE) to ensure waste equipment is disposed of in accordance with the directive at the end of their useful life.

The symbol shown below will be placed on all products manufactured from 13th August 2005, which indicates this product must NOT be disposed of with other normal waste. Upon purchasing any EEE from SEGA Amusements International Ltd. The user accepts responsibility to dispose of their waste equipment by arranging to return it to a designated UK collection point (AATF) or an Approved Exporter (AE) for the correct recycling of waste electrical and electronic equipment.

For more information on Approved Authorised Treatment Facilities (AATF) within the UK please consult the government website www.gov.uk

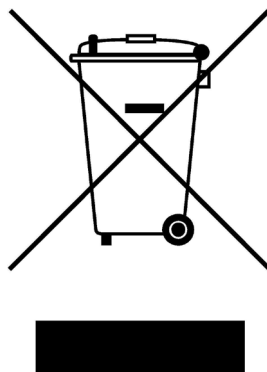
For users outside of the UK EEE should be disposed of in accordance with the local policy on the recycling of Waste Electrical and Electronic Equipment.

Battery Recycling Statement

The EC Directive on Batteries and Accumulators (2006/66/EC) aims to minimise the impact of batteries on the environment and encourage the recovery of the materials they contain. To achieve increased collection and recycling of waste batteries, the Directive places 'producer responsibility' obligations on manufacturers and importers of portable, industrial and automotive batteries.

The symbol shown below will be on all equipment fitted with batteries from 26th September 2008 and indicates they must NOT be disposed of with other normal waste. Instead, it is the user's responsibility to dispose of used batteries by arranging to return them to a designated collection point for the correct recycling.

For more information about where you can send your waste batteries for recycling contact your local authority office.



REGISTERED IN ENGLAND REGISTERED NO. 1711515

REGISTERED OFFICE: BLOCK C 42 BARWELL BUSINESS PARK, CHESSINGTON, SURREY KT9 2NY

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BEFORE USING THE PRODUCT, BE SURE TO READ THE FOLLOWING:


To maintain safety:


To ensure the safe operation of this product, be sure to read the following before usage:

The following instructions are intended for the users, operators and the personnel in charge of the operation of the product. After carefully reading and sufficiently understanding the warning displays and cautions, handle the product appropriately. Be sure to keep this Manual close to the product or in a convenient place for future reference.

Herein, explanations which require special attention are enclosed with dual lines. Depending on the potentially hazardous degrees, the terms of "DANGER", "WARNING", "CAUTION", etc. are used. Be sure to understand the contents of the displays before reading the text.

 **DANGER** Indicates that mishandling the product by disregarding this pictograph will cause severe injury or death.

 **WARNING** Indicates that mishandling the product by disregarding this warning will cause a potentially hazardous situation which can result in death or serious injury.

 **CAUTION** Indicates that mishandling the product by disregarding this caution will cause a slight hazardous situation which can result in personal injury and/or material damage.

For the safe usage of the product, the following pictographs are used:



Indicates "HANDLE WITH CARE." In order to protect the human body and equipment, this display is attached to places where the instruction manual should be referred to.



Indicates a "protective earth terminal." Before operating the equipment, be sure to connect it to the ground (this step may be omitted for products in which a power cable with earth is used).

- **Perform work in accordance with the instructions herein stated**
Instructions for work are explained by paying attention to the aspect of accident prevention. Failing to perform work as per the instructions can cause accidents. In the case where only those who have technical expertise should perform the work to avoid hazardous situation, the instructions herein state that the site maintenance personnel should perform such work
- **Be sure to turn off the power before working on the machine**
To prevent an electric shock, be sure to turn off the power and unplug the power cable before carrying out any work that requires direct contact with the interior of the product. If the work is to be performed in the power-on status, the instruction manual herein always states to that effect
- **Be sure to ground the earth terminal (this is not required in the case where a power cable with earth is used)**
This product is equipped with the earth terminal. When installing the product, connect the earth terminal to the "accurately grounded indoor earth terminal" by using an earth wire. Unless the product is grounded appropriately, the user can be subject to an electric shock. After performing repair, etc. for the control equipment, ensure that the earth wire is firmly connected to the control equipment
- **Ensure that the power supply used is equipped with an earth leakage breaker**
Using a power supply which is not equipped with the earth leakage breaker can cause a fire when earth leakage occurs
- **Be sure to use fuses which meet the specified rating (only for the machines which use fuses)**
Using fuses exceeding the specified rating can cause a fire and an electric shock

- **Specification changes (removal of equipment, conversions and additions) not designated by SEGA are not allowed**

The parts of the product include warning labels for safety, covers for personal protection, etc. It is very hazardous to operate the product by removing parts and/or modifying the circuits. Should doors, lids and protective parts be damaged or lost, refrain from operating the product, and contact where the product was purchased from or the office herein stated.

SEGA shall not be held responsible for any accidents or compensation for damage to a third party resulting from the specifications not designated by SEGA

- **Ensure that the product meets the requirements of appropriate electrical specifications**

Before installing the product, check for electrical specifications. SEGA products have a nameplate on which the electrical specifications are described. Ensure that the product is compatible with the power supply voltage and frequency requirements of the location. Using any electrical specifications different from the designated specifications can cause a fire and an electric shock

- **Install and operate the product in places where appropriate lighting is available, allowing warning labels to be clearly read**

To ensure safety for the customers, labels and printed instructions describing potentially hazardous situations are applied to places where accidents can be caused. Ensure that where the product is operated has sufficient lighting allowing the warnings to be read. If any label is peeled off, apply it again immediately. Please place an order with where the product was purchased from or the office herein stated

- **When handling the monitor, be very careful (applies only to products with monitors)**

Some of the monitor parts are subject to high tension voltage. Even after turning off the power, some portions are still subject to high tension voltage. Monitor repair and replacement should be performed only by those technical personnel who have knowledge of electricity and technical expertise

- **Be sure to adjust the monitor properly (applies only to products with monitors)**

Do not operate the product leaving on-screen flickering or blurring as it is. Using the product with the monitor not properly adjusted may cause dizziness or a headache to an operator, a player, or customer

- **When transporting or reselling this product, be sure to attach this Manual to the product**

* *In the case where commercially available monitors and printers are used in this product, only the contents relating to this product are explained herein. Some commercially available equipment has functions and reactions not stated in this manual. Read this manual together with the specific instruction manual of such equipment*

* *Descriptions herein contained may be subject to improvement changes without notice*

* *The contents described herein are fully prepared with due care. However, should any question arise or errors be found, please contact SEGA*

INSPECTIONS IMMEDIATELY AFTER TRANSPORTING THE PRODUCT TO THE LOCATION

Normally, at the time of shipment, SEGA products are in a status allowing for usage immediately after transporting to the location. Nevertheless, an irregular situation may occur during transportation. Before turning on the power, check the following points to ensure that the product has been transported in a satisfactory status:

- Are there any dented portions or defects (cuts, etc.) on the external surfaces of the Cabinet?*
- Are castors and adjusters damaged?*
- Do the power supply voltage and frequency requirements meet with those of the location?*
- Are all wiring connectors correctly and securely connected? Unless connected in the correct way, connector connections can not be made accurately. Do not insert connectors forcibly.*
- Do power cables have cuts and dents?*
- Are all accessories available?*
- Can all doors and lids be opened with the accessory keys? Can doors and lids be firmly closed?*

1 HANDLING PRECAUTIONS

When installing or inspecting the machine, be mindful of the following points and pay attention to ensure that the player can enjoy the game safely.

Noncompliance with the following points or inappropriate handling running counter to the cautionary matters herein stated can cause personal injury or damage to the machine.

WARNING

- Before performing work, be sure to turn the power off. Performing the work without turning the power off can cause an electric shock or short circuit. In cases where work should be performed in the status of power on, this manual always states to that effect
- To avoid an electric shock or short circuit, do not plug in or unplug quickly
- To avoid an electric shock, do not plug in or unplug with a wet hand
- Do not expose power cords or earth wires on the surface, (floor, passage, etc). If exposed, the power cords and earth wires are susceptible to damage. Damaged cords and wires can cause an electric shock or short circuit
- To avoid causing a fire or an electric shock, do not put things on or damage the power cords
- During or after installing the product, do not unnecessarily pull the power cord. If damaged, the power cord can cause a fire or an electric shock
- In the case that the power cord is damaged, ask for a replacement through where the product was purchased from or the office herein stated. Using the cord as is damaged can cause fire, an electric shock or leakage
- Be sure to perform grounding appropriately. Inappropriate grounding can cause an electric shock
- Be sure to use fuses meeting the specified rating. Using fuses exceeding the specified rating can cause a fire or an electric shock
- Be sure that connections such as IC BD are made properly. Insufficient insertion can cause an electric shock
- Specification changes, removal of equipment, conversion and/or addition, not designated by SEGA are not permitted
- Failure to observe this may cause a fire or an electric shock. Non-compliance with this instruction can have a bad influence upon the physical conditions of players or onlookers, or result in injury during play
- SEGA shall not be held responsible for damage or compensation for damage to a third party caused by specification changes not designated by SEGA
- Do not perform any work or change parts not listed in this manual. Doing so may lead to an accident
- If you need to perform any work not listed in this manual, request work from the office indicated in this Manual or the point of purchase, or inquires for details. Be sure to perform periodic maintenance inspections herein stated

 **WARNING**

- Do not touch undesignated places. Touching places not designated can cause electric shock or short circuit
- Whenever any fasteners (e.g. screws, nuts) have been lost, be sure to use replacement fasteners with proper dimensions as specified in this Manual. If fasteners of any other dimensions are used, it could cause damage and/or separation of parts that result in secondary accidents
- Specification changes, removal of equipment, conversion and/or addition, not designated by SEGA are not permitted
- Failure to observe this may cause a fire or an electric shock. Non-compliance with this instruction can have a bad influence upon the physical conditions of players and onlookers, or result in injury during play
- SEGA shall not be held responsible for damage or compensation for damage to a third party caused by specification changes not designated by SEGA
- Performing work or parts replacements not described in this Manual could result in accidents. If you need to perform any work not listed in this manual, request work from the office indicated in this manual or the point-of-purchase, or inquires for details
- Be sure to perform periodic maintenance inspections herein stated

 STOP**IMPORTANT**

- For the IC board circuit inspections, only the use of a logic tester is recommended. Using a Multi-Tester or General Purpose Tester may result in damage to IC Circuits
- Static electricity from your body may damage some electronic devices on the IC board. Before handling the IC board, touch a grounded metallic surface so that the static electricity can be discharged
- Some parts are not designed or manufactured specifically for this game machine. The manufacturers may discontinue or change the specifications of such general-purpose parts. If this is the case, SEGA cannot repair or replace a failed game machine whether or not a warranty period has expired

CONCERNING THE STICKER DISPLAY

This SEGA product has stickers attached describing the product manufacture No. (Serial No.) and Electrical Specifications. It also has a Sticker describing where to contact for repair and for purchasing parts.

When inquiring about or asking for repairs, **mention the Serial No. and Name of Machine indicated on the Sticker**. The Serial Number indicates the product register. Identical machines could have different parts depending on the date of production.

Also, improvements and modifications might have been made after the publication of this Manual. **In order to ensure you order the correct parts, mention the Serial No. when contacting the applicable places.**

CONCERNING WARNING DISPLAYS

This SEGA product has warning displays on stickers, labels and/or printed instructions adhered/attached to or incorporated in the places where a potentially hazardous situation could arise. The warning displays are intended for accident prevention for customers and for avoiding hazardous situations relating to maintenance and servicing work. Some portions of the cabinet contain high voltage and may cause accidents if touched. When performing maintenance, be very careful of the warning displays.

It is especially important that any complex repair and replacement work not mentioned herein should be performed by those technical personnel who have knowledge of electricity and has technical expertise.

In order to prevent accidents, caution any customer ignoring the warnings to cease and desist immediately.

2 PRECAUTIONS REGARDING INSTALLATION

WARNING

- This product is an indoor game machine. Do not install it outside. Even indoors, avoid installing in places mentioned below so as not to cause fire, electric shock, injury and/or malfunction:
- Places subject to rain/water leakage or places subject to high humidity, in the proximity of an indoor swimming pool and/or shower, etc
- Places subject to direct sunlight or places subject to high temperatures, in the proximity of heating units, etc
- Places filled with inflammable gas or vicinity of highly inflammable/volatile chemicals or hazardous matter
- Dusty places
- Sloped surfaces
- Places subject to any type of violent impact
- Vicinity of anti-disaster facilities such as fire exits and fire extinguishers
- Areas where the temperature exceeds the applicable temperature (ambient temperature) range of 5 to 30 degrees centigrade

LIMITATIONS OF USAGE

WARNING

- Be sure to check the Electrical Specifications. Ensure that this product is compatible with the location's power supply, voltage, and frequency requirements. A plate describing Electrical Specifications is attached to the product. Noncompliance with the Electrical Specifications can cause a fire and electric shock
- This product requires a breaker and earth mechanism as part of the location facilities. Using the product without these can cause a fire and electric shock
- Ensure that the indoor wiring for the power supply is rated at 15 A or higher (AC single phase 100 V ~ 120 V area), and 7 A or higher (AC 220 V ~ 240 V area). Noncompliance with the Electrical Specifications can cause a fire and electric shock
- Be sure to use an independent power supply equipped with an earth leakage breaker. Using a power supply without an earth leakage breaker can cause an outbreak of fire if a power surge occurs
- Putting many loads on one electrical outlet can cause generation of heat and a fire resulting from overload
- When using an extension cord, ensure that the cord is rated at 15 A or higher (AC 100 V ~ 120 V area) and 7 A or higher (AC 220 V ~ 240 V area). Using a cord rated lower than the specified rating can cause a fire and electric shock


IMPORTANT

Securing a safe area for operation as described in this Manual will ensure safe operation for players and observers

SEGA shall not be held responsible for damage or compensation for damage to a third party, resulting from the failure to observe this instruction

OPERATION AREA (SINGLE CABINET)

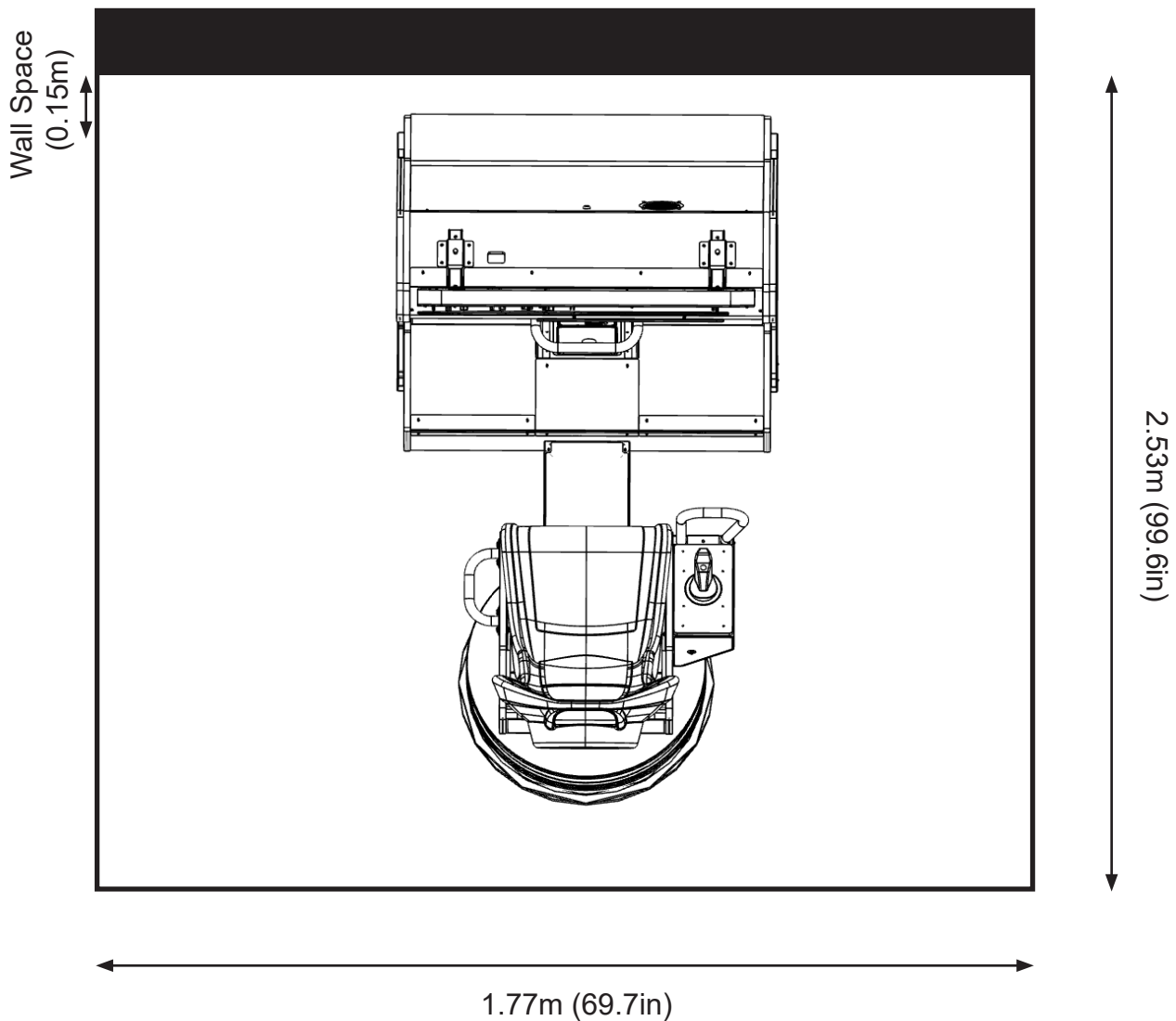

WARNING

- For safe operation, use and operate this product in an area measuring at least **1.77m (69.7in)** in width and **2.53m (99.6in)** in depth when the Cabinet is installed. SEGA shall not be held responsible for damage or compensation for damage to a third party, resulting from the failure to observe this instruction
- The ceiling where this product is installed must be at least **1.88m (74in)** high. If the ceiling is too low, the heat emitted from the product may cause it to catch on fire
- Be sure to provide the sufficient space specified in this Manual. Do not allow objects to block the ventilation ports. This can cause generation of heat and a fire
- Put multiple Cabinets close together so that people cannot get through or provide enough space between them that people can go both ways without difficulty. If Cabinets are installed carelessly, people may bump into each other or the Cabinets when passing between them or fall down. To prevent people from walking between them, place them 0.15 m (5.9 in) apart
- If the machine does not fit through the entryway to the installation location, do not disassemble it without first consulting the instructions. Specific tools and adjustment procedures are required to assemble and disassemble the mechanical parts. Attempting to assemble or disassemble the machine without consulting the instructions may result in accidents during assembly/disassembly, electric shock, short circuits, and/or personal injury during operation. If the machine still does not fit through the entryway after following the procedures in this Manual, contact your retailer or the office listed in this Manual
- If the machine is still too large to fit through the entryway after following the procedures listed in this Manual, do not tip the machine on its side. Attempting to transport the machine while it is tipped on its side may cause accidents. It may also damage or warp parts of the machine, resulting in accidents during operation

⚠ WARNING

- To install this product, the entrance must be at least **0.91m (35.8in)** in width and **1.88m (74in)** in height. If the entrance is too narrow, do not tilt the product carelessly. If all the product weight is put on the castors at one side only, there could be damage or deformation, causing serious accidents such as workers getting caught underneath

Wall



3 PRECAUTIONS REGARDING OPERATION

To avoid injury and trouble, be sure to pay attention to the behaviour of visitors and players.

3-1 BEFORE OPERATION

WARNING

- In order to avoid accidents, check the following before starting the operation:
- To ensure maximum safety for the players and the customers, ensure that where the product is operated has sufficient lighting to allow any warnings to be read. Operation under insufficient lighting can cause bodily contact with each other, hitting accident, and/or trouble between customers
- Be sure to perform appropriate adjustment of the display (LCD, Plasma, or Projector). For operation of this machine, do not leave monitor's flickering or deviation as is. Failure to observe this can have a bad influence upon the players' or customers' physical conditions
- It is suggested to ensure a space allowing the players who feel sick while playing the game to take a rest
- Check if all of the adjusters are in contact with the surface. If they are not, the Cabinet can move and cause an accident
- Do not put any heavy item on this product. Placing any heavy item on the product can cause a falling down accident or parts damage
- Do not climb on the product. Climbing on the product can cause falling down accidents. To check the top portion of the product, use a step/stepladder
- To avoid electric shock, check to see if door and cover parts are damaged or omitted
- Do not place the following items on top of or near the product or hang them from the ceiling. Doing so could result in electric shock, short circuits and/or damage to the parts:
- Flower vases, flowerpots, cups, water tanks, cosmetics, and receptacles/containers/vessels containing chemicals and water

CAUTION

- To avoid injury, be sure to provide sufficient space by considering the potentially crowded situation at the installation location. Insufficient installation space can cause contact, collisions, and/or trouble between customers
- During daily cleaning, be sure to check the surface of the control units and other parts that the player touches with his/her hands for damage, cracks, or loose screws. If a player uses the machine while it is damaged, cracked, or has a loose screw, the player may become injured
- Check carefully to make sure there are no gaps in the Cabinet joints and that they are not loose. If there are gaps or looseness, players may get their hands or fingers caught, resulting in an injury
- Make sure all the doors are locked securely and they do not rattle. If the doors are not locked properly or there are gaps or rattling, players could get their fingers or hands caught
- Be sure to perform appropriate adjustment of the LCD. For operation of this machine, do not leave monitor's flickering or deviation as is. Failure to observe this can have a bad influence upon the players' or customers' physical conditions
- Inspect for the following items during a trial run. If there is any type of error, use the Test Mode, etc. to resolve the problem. If you continue use with an error, it can cause an accident or irreparable parts damage:
 - Is there any irregularity in the operability of the control units?
 - Is there any improper adjustment of the LCD screen?
- Prepare a place where players can rest if they feel unwell

3-2 PAYING ATTENTION TO CUSTOMERS

To avoid injury and trouble, be sure to constantly give careful attention to the behaviour and manner of the visitors and players.

DURING OPERATION (PAYING ATTENTION TO CUSTOMERS)

WARNING

- For safety reasons, do not allow any of the following people to play the game:
 - Those who have high blood pressure or a heart problem
 - Those who have experienced muscle convulsion or loss of consciousness when playing video games, etc.
 - Those who have neck or spinal cord problems
 - Those who are intoxicated or under the influence of drugs
 - Pregnant women
 - Those who are not in good health
 - Those who do not follow the attendant's instructions
 - Those who cannot grasp the Control Units securely because of immobility in fingers, hands or arms
 - Persons who disregard the product's warning displays
- Even players who have never been adversely affected by light stimulus might experience dizziness or headache depending on their physical condition when playing the game

Small children are especially likely to experience these symptoms. Caution guardians of small children to keep watch over them during play

- Instruct those who feel sick during play to have a medical examination
- To avoid injury from falls and electric shocks due to spilled drinks, instruct the player not to place heavy items or drinks on the product
- To avoid electric shocks and short circuits, do not allow customers to put hands, fingers or extraneous matter in the openings of the product or small openings in and around the doors
- To avoid falls and resulting injury, immediately stop the customer from leaning against or climbing on the product, etc.
- To avoid electric shock and short circuit, do not allow customers to unplug the power plug without a justifiable reason
- Instruct the guardians of small children to keep watch over their children

Children cannot sense danger. Allowing small children to get near a player who is playing the game could result in the children being bumped, struck or knocked down

STOP IMPORTANT

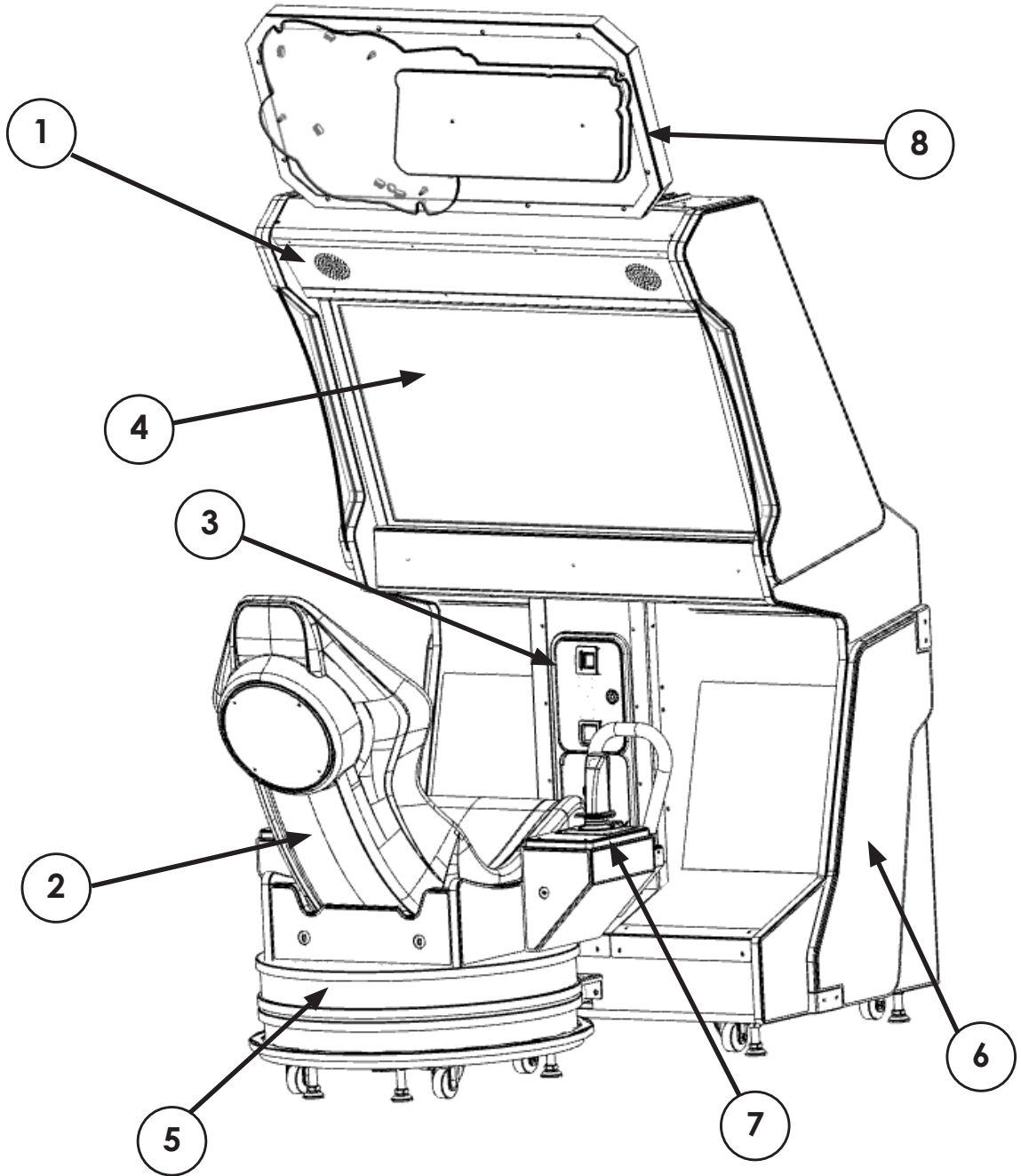
- Diligently clean the parts that players touch directly to ensure a pleasant game playing experience
- Inspect the coin insertion slots to make sure no foreign objects have been inserted and that they have not otherwise been tampered with as this will prevent play

CAUTION

- Immediately stop such violent acts as hitting and kicking the product. Such violent acts can cause parts damage or falling down, resulting in injury due to fragments and falling down
- Persons other than the player should not be allowed to touch the controls during play. They may brush against or collide with the controls or the player, possibly resulting in accidents
- Instruct those who feel sick during play to have a medical examination
- Immediately stop users from leaning or sitting on the control panel. Such acts can lead to injury or damage to parts or the shape of the Cabinet
- Items such as large finger rings can cause injury to the fingers while playing. Instruct players to remove all accessories that could cause an accident before playing

4 PART DESCRIPTIONS

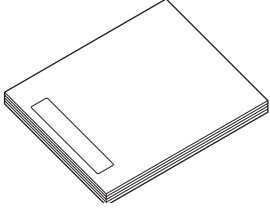
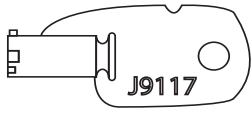
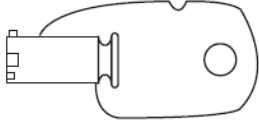
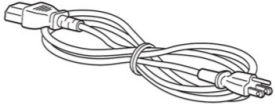
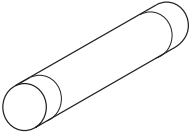
4 PART DESCRIPTIONS



1	Speakers
2	Seat
3	Coin Tower
4	Monitor
5	Pedestal
6	Monitor Cab
7	Joystick (Controller)
8	Billboard

5 ACCESSORIES

Confirm that the accessories listed in the table below are present when setting up the product.
Accessories marked “Spare” are consumable items but included as spares.

Part Name / Number	Diagram	Quantity
Owner's Manual (Part #: 420-0039UK)		1
Master Key (J9117)		4
Security Key (A444)		2
Power Lead UK (Pt No LM1227) EU (Pt No LM1246) US (Pt No LM1500UK)		1ea
Spare Fuse (Fitted to ASSY AC UNIT)		1

6 ASSEMBLY AND INSTALLATION

WARNING

- Perform assembly work by following the procedure herein stated. Failure to comply with the instructions can cause electric shock
- Perform assembling as per this Manual. Since this is a complex machine, incorrect assembling can cause an electric shock, machine damage and/or improper functioning as per specified performance
- When assembling, more than one person is required. Depending on the assembly work, there are some cases in which working by one person alone can cause personal injury or parts damage
- Ensure that connectors are properly connected. Improper connections can cause electric shock
- Be careful not to damage the wires. Damaged wires may cause electric shock or short circuit or present a risk of fire
- This work should be carried out by site maintenance personnel or other qualified professionals. Work performed by non-technical personnel can cause a severe accident such as electric shock. Failing to comply with this instruction can cause a severe accident such as electric shock to the player during operation. If no one with proper technological expertise is available, request service from the office indicated in this document or the point of purchase so as to ensure safety
- Provide sufficient space so that assembling can be performed. Performing work in places with narrow space or low ceiling may cause an accident and assembly work to be difficult
- To perform work safely and avoid serious accident such as the Cabinet falling down, do not perform work in places where step-like grade differences, a ditch, or slope exist
- Do not leave power cords or Ground Wires exposed in areas of heavy foot traffic. Doing so may cause them to become damaged, possibly resulting in electric shock and/or short circuits. When laying wiring across the floor, always use safety covers to protect the wires. (Wiring diameter: power cable - approx. \varnothing 8)
- Have a flashlight or another supplementary lighting unit available while working. With indoor lighting alone, the Cabinet interior may be too dark. Working without proper lighting can lead to accidents. It also hinders proper work performance
- The Cabinet has ventilation ports. Be sure not to block them. If they are blocked, heat can build up, leading to fire. This can also accelerate wearing of parts and malfunctions
- Secure ample ventilation space around the Cabinet. If heat builds up, there could be accidents associated with heat or smoke generation
- This product does not use any connectors other than those connected to and used by the game board when it leaves the factory. Do not needlessly connect wires to unused connectors. This could lead to overheating, generation of smoke and burn related injuries

CAUTION

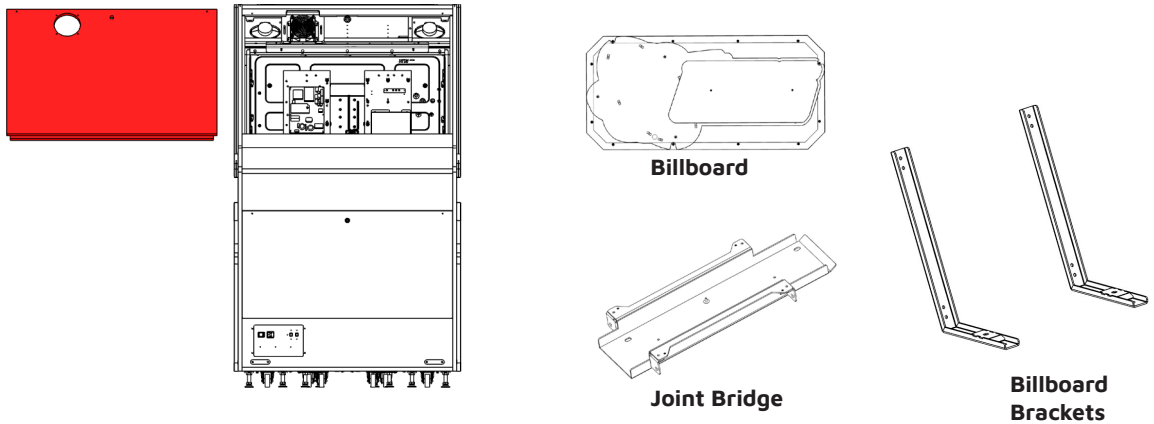
- Handle molded parts with care. Excessive weight or pressure may cause them to break and the broken pieces may cause injury
- To perform the operation safely and accurately you must use a safe, steady footstool or stepladder. Working without this may lead to a fall and possible injury
- When attaching or removing doors or lids, be careful that your hand or finger does not get caught in anything

IMPORTANT

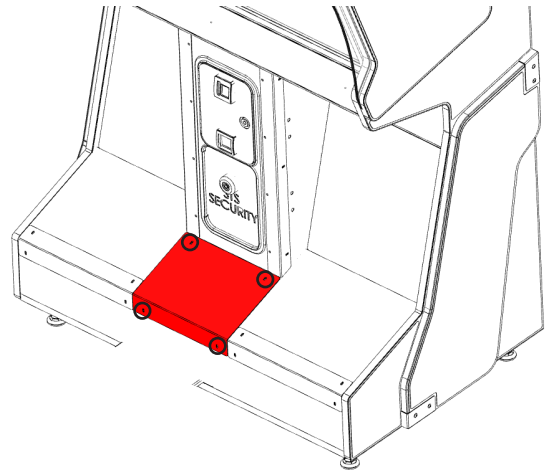
- Be very careful when handling the LED display screen. The screen can be damaged easily and cannot be repaired once damaged. Such damage can only be repaired by completely replacing the screen
- Be careful not to damage parts surfaces. In some cases, if such surfaces are damaged, the part must be replaced; it cannot be reinforced or repaired

6-1 INSTALLING THE MONITOR AND SEAT CABINET

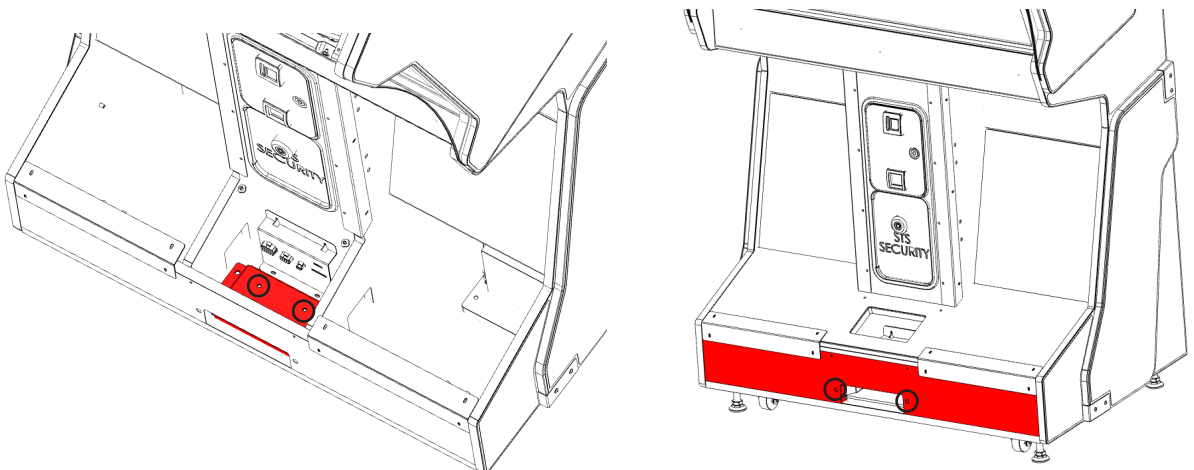
- 1 Unlock and remove the Back Door Upper. Remove the Billboard, Billboard Brackets, and Joint Bridge from the Rear of the Cabinet (the Billboard harnessing may need minor adjustment due to transit)



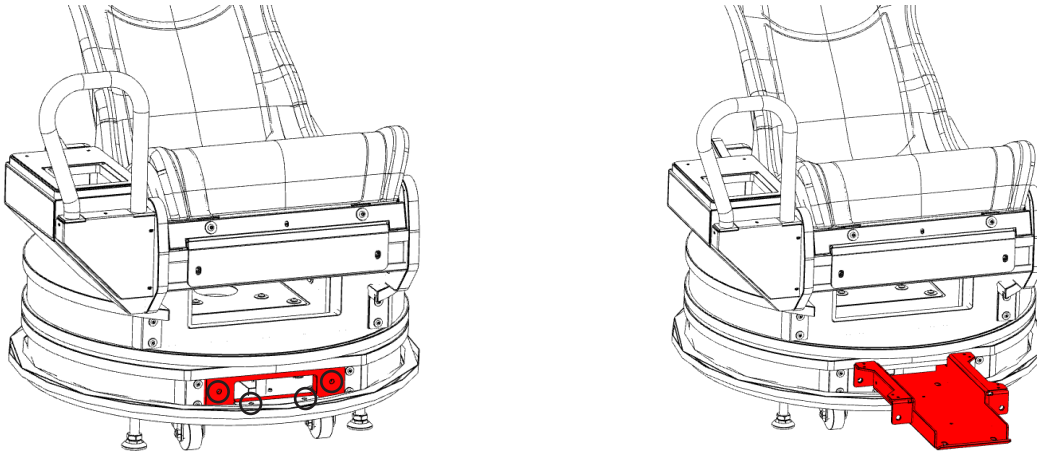
- 2 Remove the (4) M4x25 fixings from the Plate Joint Bridge Access



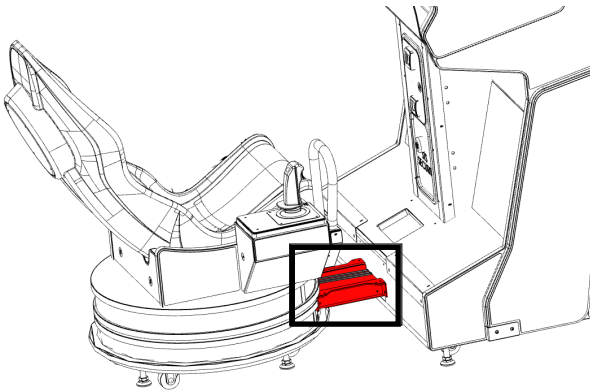
- 3 Remove the (4) fixings that are located in situ on the Bracket Front Bridge Joint and the Front Cabinet



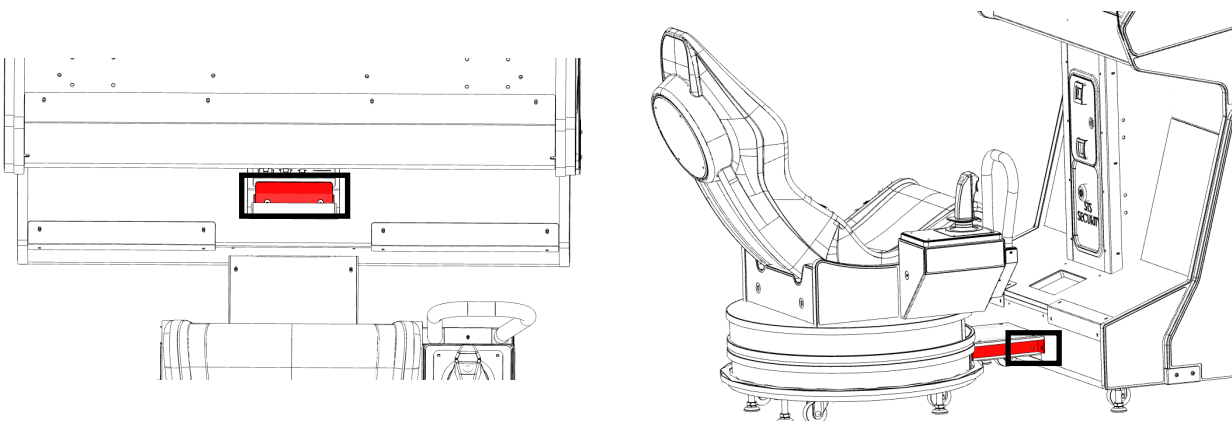
- 4** Remove the (4) fixings that are located in situ on the front of the Seat Cabinet. Place the Joint Bridge into the position show and reapply the (4) removed fixings to secure in place



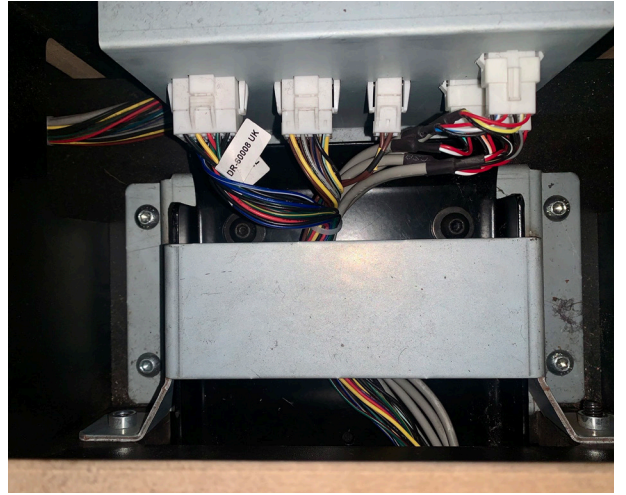
- 5** Insert the Seat Cabinet into position, inserting the Joint Bridge into the Monitor Cabinet (be sure to pull all Wire Harnesses from the Seat Cabinet through the Joint Bridge and into the Monitor Cabinet)



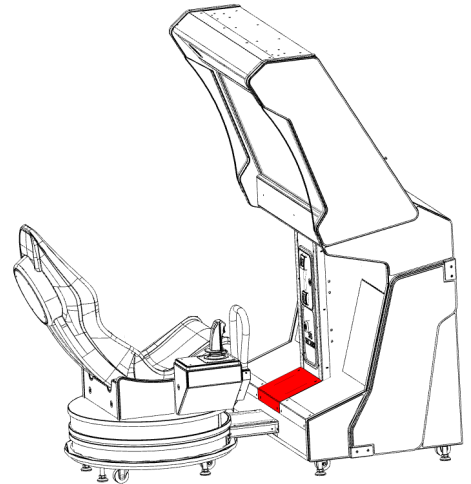
- 6** Reapply the (4) situ fixings removed in Step 2



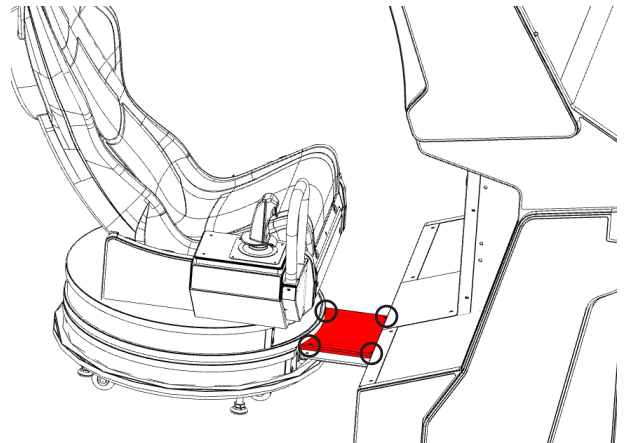
7 Connect the Wire Harnesses from the Seat Cabinet to the Monitor Cabinet



8 Reapply the Plate Joint Bridge Access and secure with the (4) removed fixings from Step 1

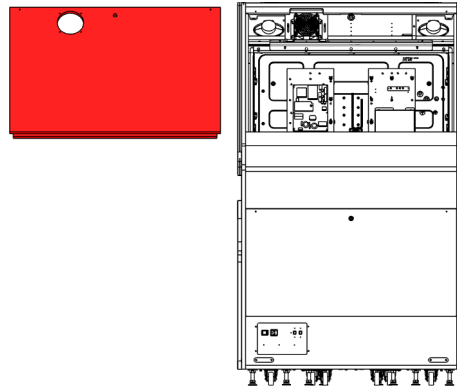


9 Apply the Cover Joint Bridge and secure with the (4) fixings

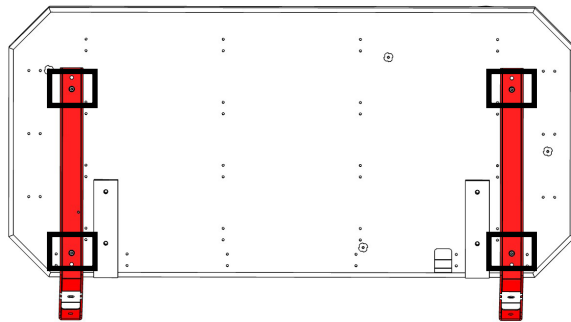


6-2 INSTALLING THE BILLBOARD

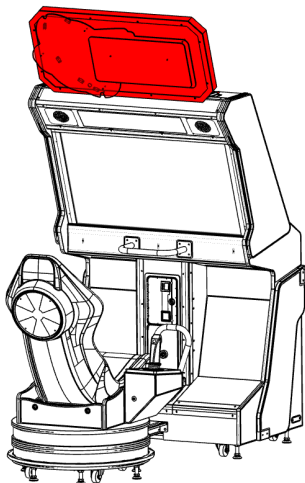
- 1 Unlock and remove the Back Door Upper



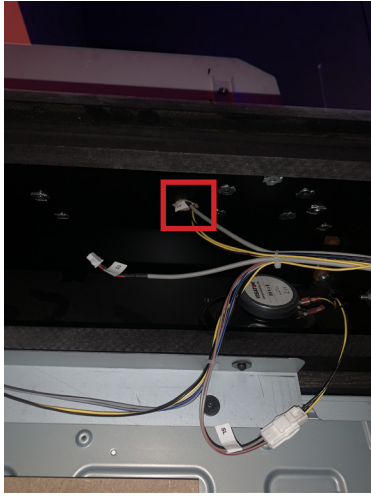
- 2 Using the Brackets removed in Step 6-1-1, attach these to the Billboard as shown using (4) M6 fixings (2 on each bracket)



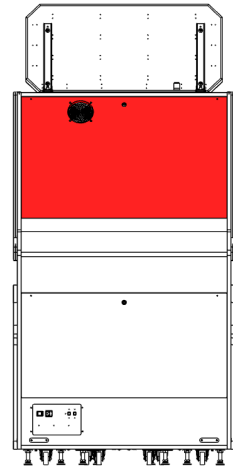
- 3 Insert the Billboard Brackets into the Billboard Bracket Retaining (the pins may need to be pulled up to allow the Billboard Brackets to be fully inserted)



4 Connect the Wire Harnesses from the Monitor Cabinet to the Billboard



5 Reapply and lock the Back Door Upper

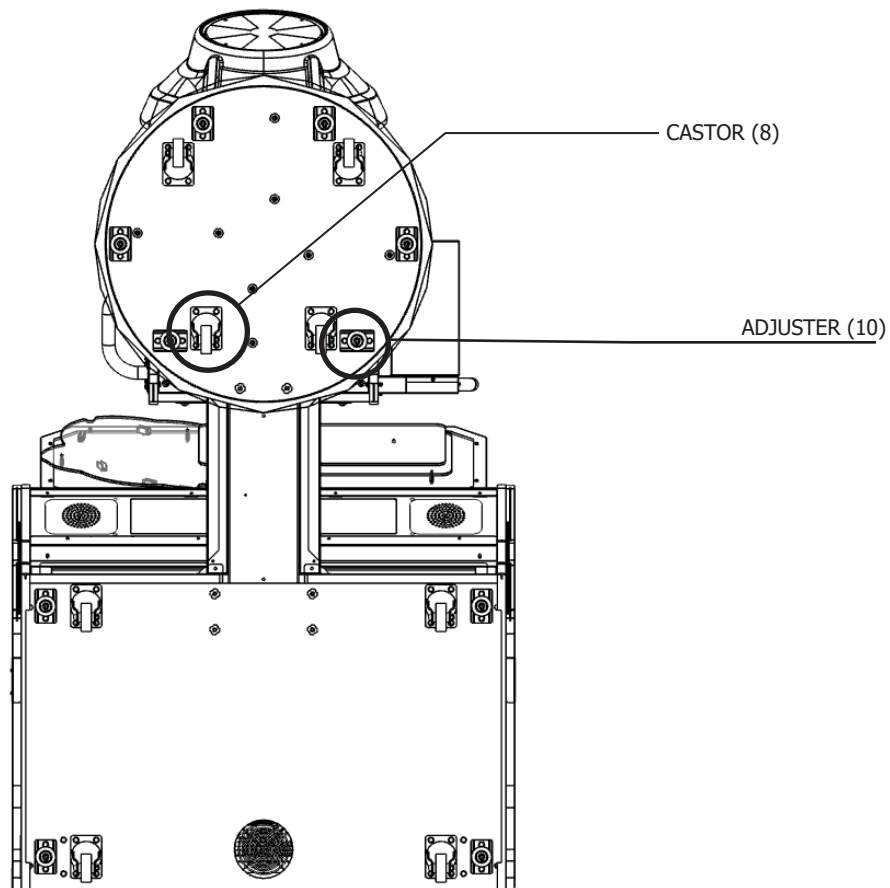


6-3 FIXATION TO INSTALLATION SITE

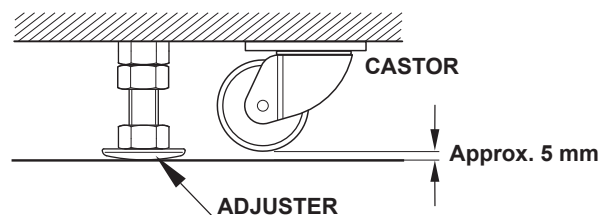
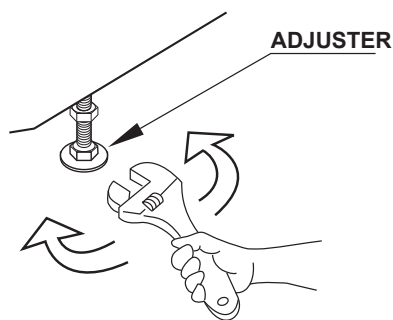
WARNING

Make sure that all the adjusters contact the floor. Otherwise the Cabinet could move, causing an accident

The product comes with castors attached at 8 locations and adjusters at 10 locations. When the installation site has been determined, have the adjusters come in direct contact with the floor. Establish a gap of about 5 mm between the floor and the castors and adjust the unit so that it will remain level.



- 1** Move the product to the installation site. If the product is to be installed near a wall, secure enough passage-way space for players to access the seat. You must also secure a 15cm space between the back wall and the back of the cabinet for ventilation.
- 2** Bring the adjusters into direct contact with the floor. Use a wrench to align the height of the adjusters until the cabinet is perfectly level.
- 3** After setting, turn adjuster nuts upwards to tighten them and secure adjuster heights.



CONNECTION OF POWER AND GROUND CABLES

(Only applies where an integral earth is not present in the mains/power lead.)

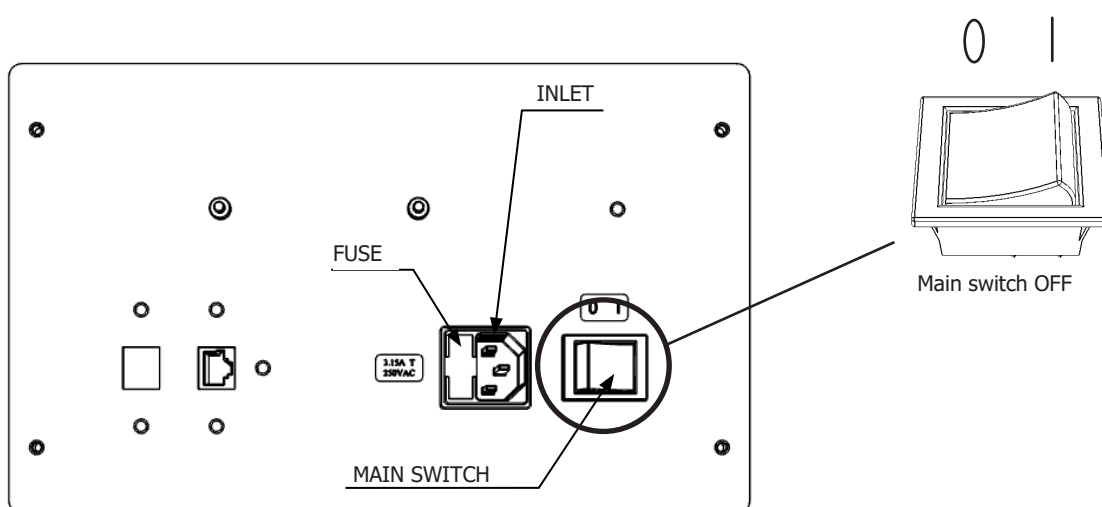
WARNING

- Use the power supply equipped with an earth leakage breaker. Use of power supply without such a breaker could result in fire if there is a current leakage
- Have available a securely grounded indoor ground terminal. Without proper grounding, customers could be electrocuted and product operations might not always be stable
- Do not expose the power cord or ground wire. If these are exposed, customers could stumble over them, for instance, and easily damage them. Additionally, if these lines are damaged, there could be a risk of electrical shock or short circuit. Set these lines at locations where they will not interfere with customer traffic, or attach covers to them
- After laying out the power cord on the floor, be sure to always protect it. If the power cord is left exposed, it can easily be damaged, resulting in electrical shock
- When using the product's AC unit ground terminal, use ground wire with a circular terminal as shown in the illustration, and establish ground securely. Avoid indiscriminate grounding operations such as use of wire with only its sheath peeled off

STOP IMPORTANT

If grounding has been established with the ground wire inside the power cord, do not perform grounding with the AC unit ground terminal. Conversely, if the AC unit ground terminal has been used for grounding, do not establish ground with the ground wire in the power cord. Otherwise there could be faulty or erroneous operations

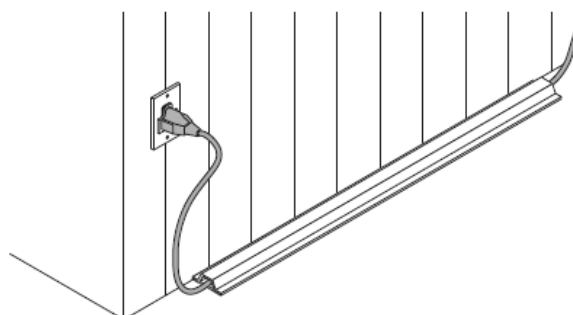
- 1 Confirm that the main switch is at OFF



- 2 Fully insert the power cord connector on the side opposite the power plug into the AC unit inlet

- 3 Fully insert the power cord plug into the outlet

- 4 The power cord is laid out indoors. Protect the power cord by attaching wire cover to it. If ground will be established with a ground wire made available separately, lay out the ground wire indoors and have it protected

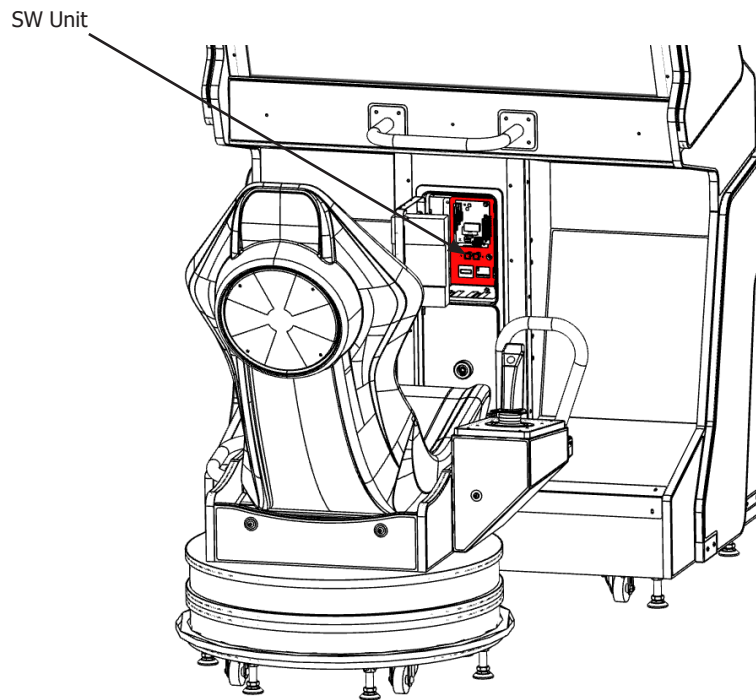


6-4 CONFIRMATION OF INSTALLATION

Use test mode to confirm that assembly is proper, connecting boards, and input/output devices are normal. See Section 9 “Test and Service Data” for more information on each individual test.

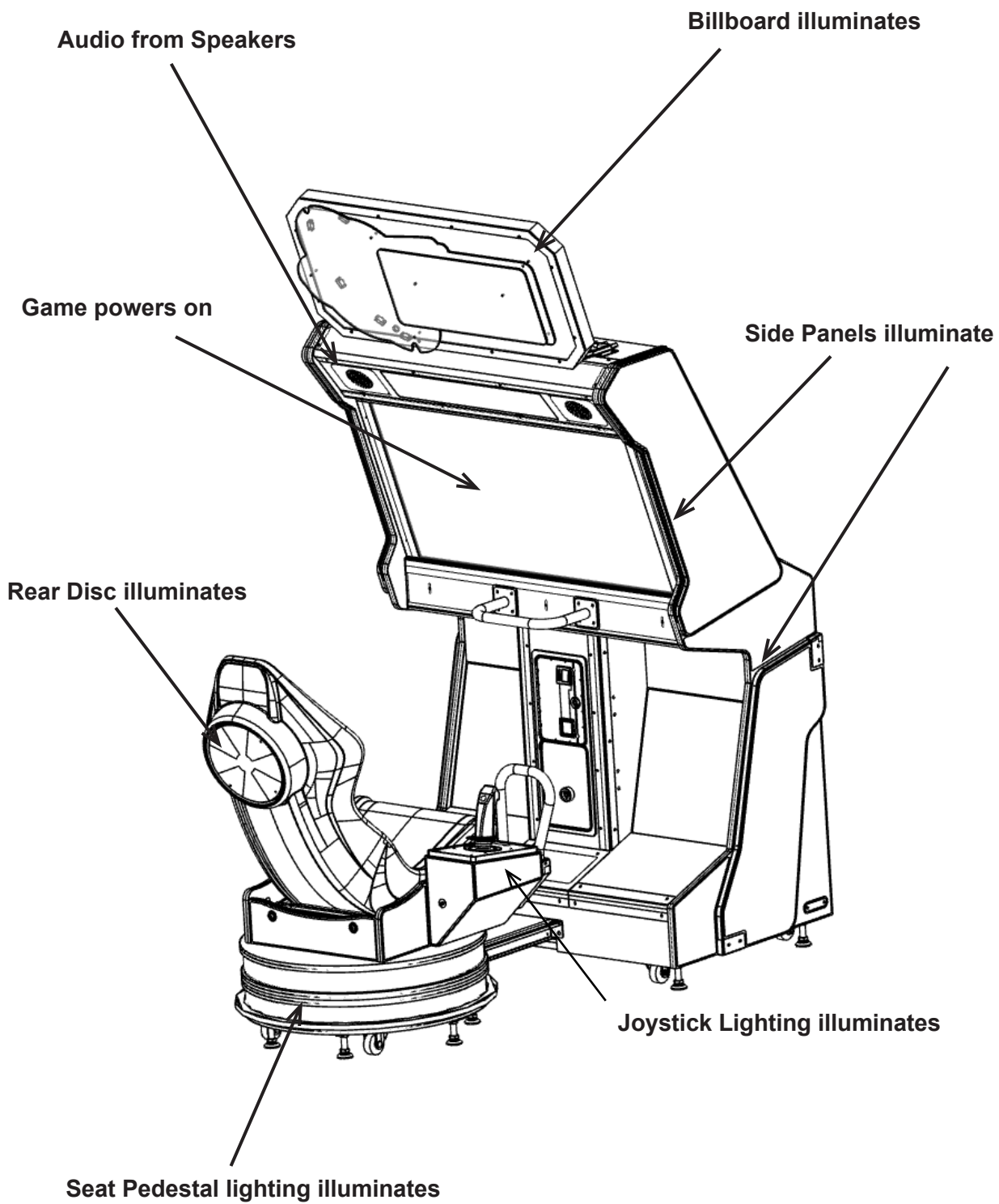
Perform the following tests in test mode:

- 1 Unlock and open the Coin Door to access the SW Unit. Use the Test Button to enter the Test and Service Menu



- 2 Enter the section “Input Test”. Ensure all Controller components and Buttons are functioning correctly
- 3 Enter the section “Output Test”. Ensure all LEDs and speakers are functioning correctly

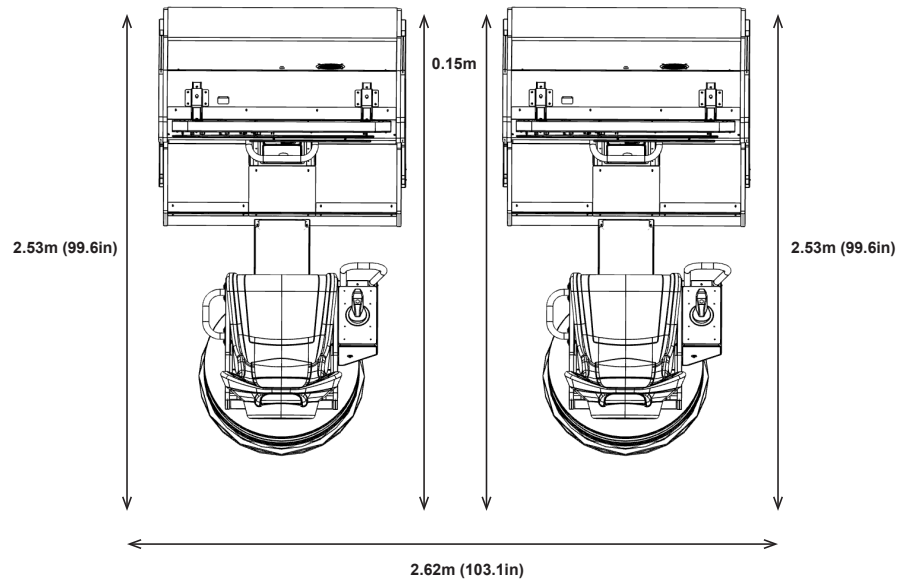
6-5 COMPONENTS THAT CHANGE STATE UPON POWERING UP



6-6 LINKING MULTIPLE CABINETS

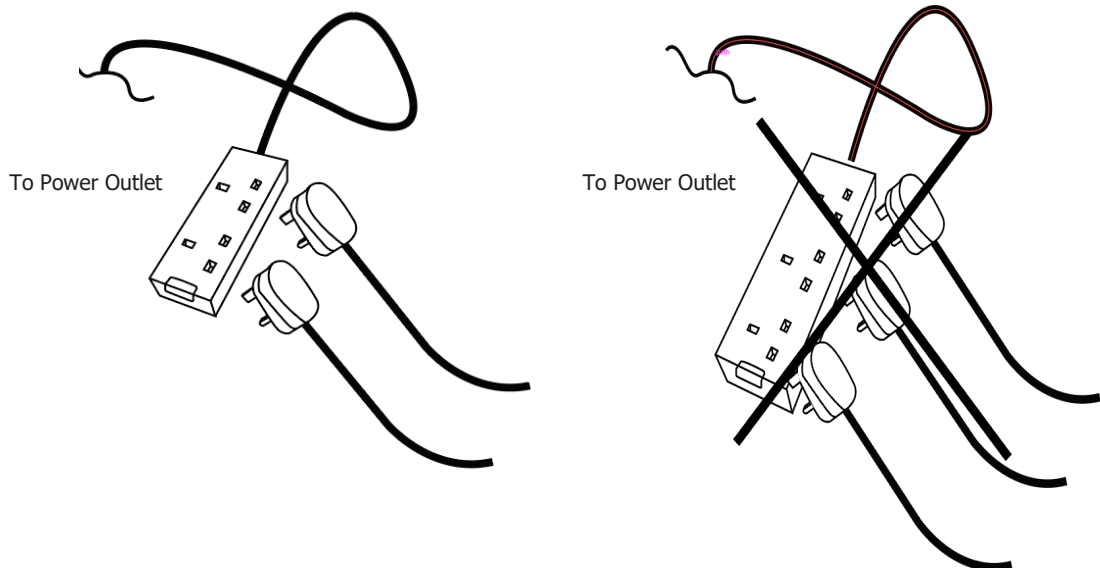
It is important that a suitable location is secured to enable installation to be carried out safely.
Please refer the beginning of this manual for Operational Area.

- 1 Carefully place (2) Cabs into position. Follow the guidelines in the OPERATIONAL AREA in the beginning of this Manual, and see the diagram below for suggestions on a suitable space for multiple Cabinets



STOP IMPORTANT

Each Cabinet has its own dedicated mains power input. Only use the power leads supplied with this machine. When connecting 4 Cabinets together, please refrain from using Multi-socket extension cables. DO NOT place more than 2 units in a single Multi-socket extension cable (not supplied). Connecting more than 2 units in a single power extension cable may overload the circuit and cause possible electrical damage or even fire



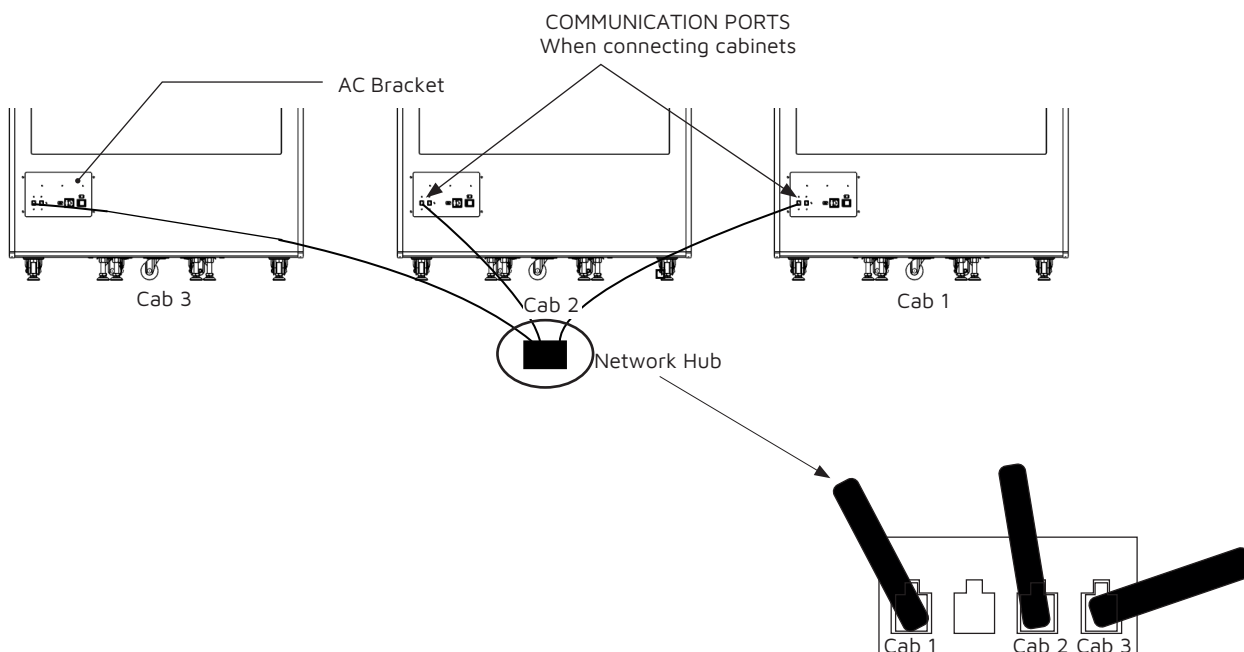
When installing two or more Cabinets it is recommended that they be linked together via network cables and hub to encourage multiple play, whereby players race together in the same race. Note: a 100mb network hub is required to link 3 or more Cabinets.

STOP IMPORTANT

When powering the machine on for the first time, be sure **NOT** to have the network cables connected to the Cabinets and/or network hub. Having the network cables connected when powering up for the first time will cause a network malfunction and incorrect IP addresses will be assigned

- 1 Apply power to the Cabinet and enter the TEST menu using the TEST SW located behind the coin door on the Credit Board
- 2 Select **NETWORK SETTINGS > LINK PLAY > ON**. Select **NETWORK SETTINGS > TOTAL LINKED CABINETS**. Assign the number of total Cabinets to be linked in the network
- 3 Select **NETWORK SETTINGS > CABINET ID**. Assign ID 2 to the second Cabinet, Assign ID 3 to the third Cabinet, etc. (Your designated first Cabinet will be ID 1 by default, and will not need to be changed).
- 4 Confirm changes. The Cabinets will reboot individually upon confirming the Cabinet ID. **Note: Cabinet 1 will NOT reboot.** Allow Cabs to enter back into game
- 5 Turn power to all Cabs OFF. Using the LAN Cables, connect each Cabinet network port situated on the AC Bracket into a network hub. If setting up 2 cabs only, link the Cabinets by plugging the LAN cables into each Game Board directly. A maximum of 4 Cabinets can be linked together
- 6 Power on all cabinets (ensuring the LAN cables are plugged in) and observe them as they enter into game

If networking is unsuccessful, disconnect all LAN cables. Enter Test Mode and select **NETWORK SETTINGS > CABINET ID** and revert all Cabs to **Cabinet ID 1** (cabs will reboot). In Test Mode, select **SYSTEM INFORMATION > RESET TO FACTORY DEFAULTS** and confirm (cabs will reboot). When all Cabinets have rebooted and entered into game, power cycle all cabs and repeat Steps 1 - 6.



7 PRECAUTIONS WHEN MOVING

7-1 MOVING THE MACHINE

WARNING

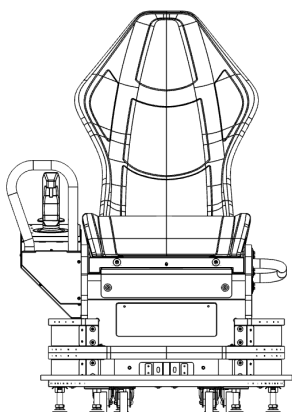
- Always disconnect the power cable before moving the product. If it is moved with the power cable connected, the cable could be damaged, causing fire or electric shock
- To move the unit over the floor, pull in the adjusters and have the castors contact the floor. While moving the unit, be careful that the castors do not roll over the power cord or the ground wire. If cord or wire is damaged, there could be electrical shocks and/or short circuits
- When crossing a sloped or stepped area, disconnect the individual pieces of the Cabinet (Monitor Cab, Seat, and Billboard). If you tilt them while connected together, the connection points may be damaged and personnel could be injured
- When lifting the Cabinet up steps, you must hold it by the designated handles or by the bottom surface. Lifting it by any other area may lead to damage or disfiguration to that part or surrounding parts due to the weight of the Cabinet and could also lead to injury of personnel
- When tilting the Cabinet to move it across a sloped or stepped area, always use at least two people. Attempting such an operation alone can lead to accident or injury
- When moving the components separately, take care concerning the direction you push the each Cabinet section in. These elements may fall over, causing damage or an accident

CAUTION

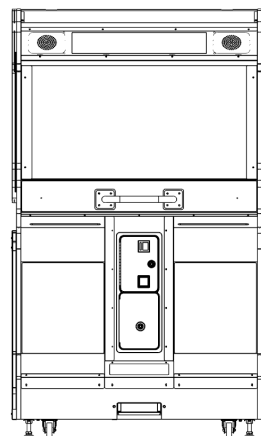
- When moving the components, do not push any of the plastic elements or shaped parts and do not use them to pull the components along. This may damage the parts or the surrounding parts and this could lead to accidents or injury
- When moving the separated components, be sure to push/pull each Cabinet piece lengthways. Trying to move the Cabinet any other way may cause the Cabinet to topple over

STOP IMPORTANT

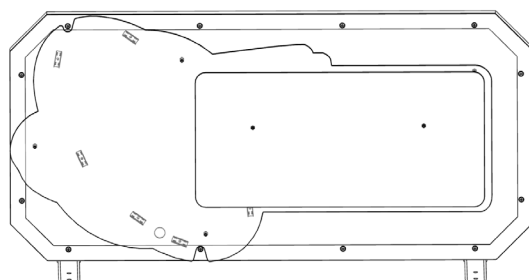
- When moving the Cabinet, do not hold, push, or pull the Control Units. This may disfigure or damage them
- If you need to move components through a narrow or low door and the only way to get the separated components through is to turn them on their side, or if a separation method other than those described in this Manual is required, either make a request to the office listed in this document or the place of purchase to perform the operation or contact them regarding how to perform it. Carelessly turning the components onto their side or separating them in ways other than those depicted in this Manual may lead to irreparable damage
- Do not press the monitor screen. The screen can be easily damaged and cannot be repaired if it is, meaning complete replacement will be necessary



Assy Seat



Monitor Cab



Billboard

8 GAME DESCRIPTION

8-1 GAME OUTLINE

After the coins are inserted, available Credits will display at the bottom of the screen. After required coins are inserted, the text will change from “PLEASE INSERT COINS” into “PULL TRIGGER TO START”. The Trigger is used to start the game once coins have been inserted.

Coin system can accumulate up to 24 Credits. Credits beyond 24 will not be counted and returned to Player. When the 24 Credit limit is reached, it will be recorded in the Test Menu under Coin Settings > Coin Count. It will also be recorded physically on the Credit Board.

Based on the active test mode settings, “INSERT COIN(S)”/“INSERT MORE COIN(S)” may change to “SWIPE CARD TO PLAY”.



8-2 MODES OF PLAY

The player can choose from the following game modes:

- **Quick Race** - Players can race alone without other human racers
- **Championship** - Players race the 4 tracks of the game in a row and must finish within time limit in order to progress to the next race
- **Multiplayer** - Players can race against other human racers along with AI opponents, if multiple Cabinets are linked up and a player adds a Credit to start a lobby

If a Credit is entered and no other players join the lobby it will then transition to the mode select screen which will allow the player to choose between Quick Race & Championship modes.



Track Select

After selecting Quick Race or after all human racers have entered a Multiplayer lobby, the player will be directed to the Track Select screen. The difficulty of each Track is shown below the name and background preview video of the level in the bottom left. Change Tracks by moving the Joystick left and right and confirm using the Trigger Button (Boost Trigger).

The Player can choose from:

- Ocean Resort (Beginner)
- Snowy Mountain (Normal)
- Metro City (Hard)
- Nature Park (Very Hard)

If the Player does not select a Track before the timer reaches zero, the Track they are currently selecting will be chosen. In a Multiplayer lobby, the first player to select a track will dictate what track will be played.



Drone Select

After selecting a track to play, the player must choose their Drone Team to race as/for.

The player can choose from:

- Opqa-Opqa (Balanced Type 1)
- Dark Age (Balanced Type 2)
- ZaxxenZ (Acceleration Type)
- Flick-E (Top Speed Type 1)
- Thonder Blade (Top Speed Type 2)

If the player does not select a Drone Team before the timer reaches zero, the Drone Team they are currently selecting will be chosen.



In Race Screen

The in-race screen and Player HUD are detailed below:



- 1 - **Drone Positions** - Shows positions of all Drones (including the player)
- 2 - **Timer** - Time remaining to reach the next checkpoint
- 3 - **Boost Energy** - Amount of Boost available to the player
- 4 - **Position Indicator** - Shows current race position out of total racers
- 5 - **Lap Indicator** - Shows current lap the player is on out of total laps
- 6 - **Race Time** - Total race time
- 7 - **Lap Time** - Shows individual lap times
- 8 - **Speedometer** - Shows current speed

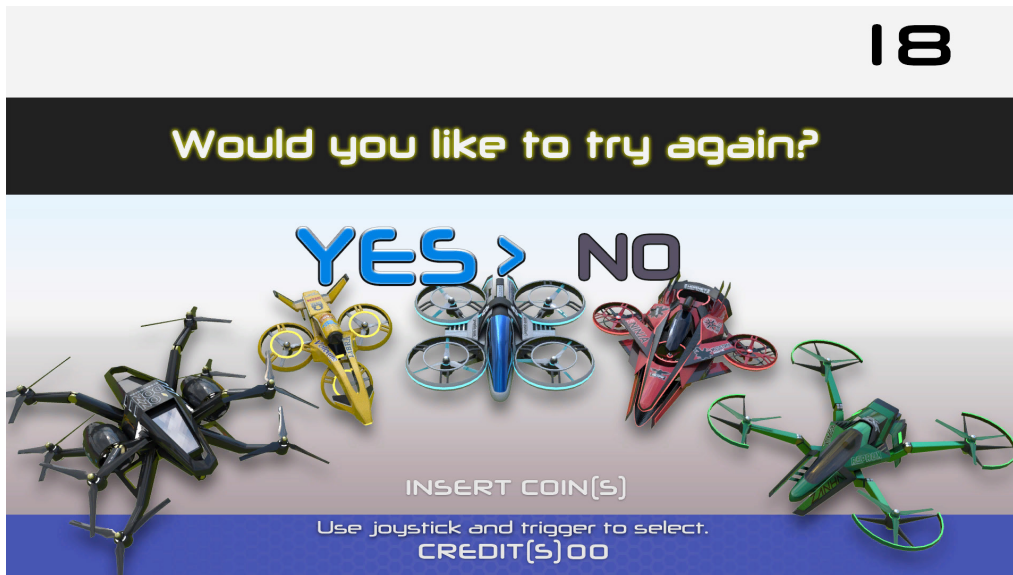
After finishing a race, the player is told their ranking/position, total time taken to complete the race & the time taken to complete each lap (depending on the race length, determined by an option in the test menu). The player will then be able to enter a three-letter name at the Name Entry screen.



Continue Screen

They will also be asked if they would like to try the race again on the same track using the same drone. If the player adds another Credit they can try again by selecting "Yes" or they can navigate back to the attract sequence by selecting "No".

If they Player does not enter a Credit before the timer reaches zero, the game will end. If the player adds a Credit before the timer runs out the timer will reset.



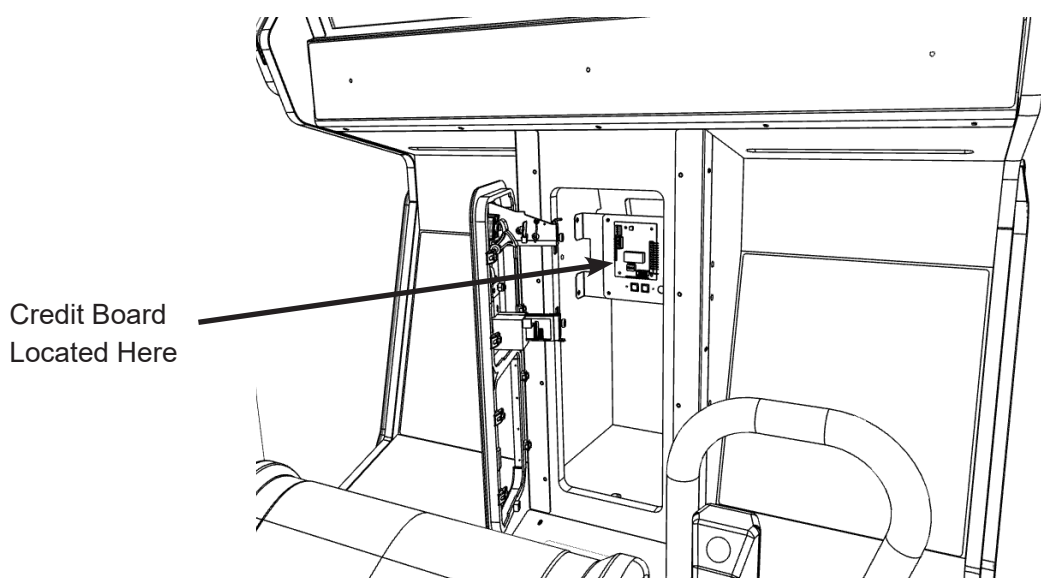
9 EXPLANATION OF TEST AND DATA DISPLAY

⚠ WARNING

Do not touch any parts that are not specified in these directions. Touching unspecified locations may lead to electric shock or cause short circuits

⚠ CAUTION

- Be careful that your finger or hand does not get caught when opening/closing the coin chute door
- Operating the TEST Button and SERVICE Button during Test Mode may be slightly awkward due to their position. Take care when operating the Credit Board, or any other positions within the internal Cabinet



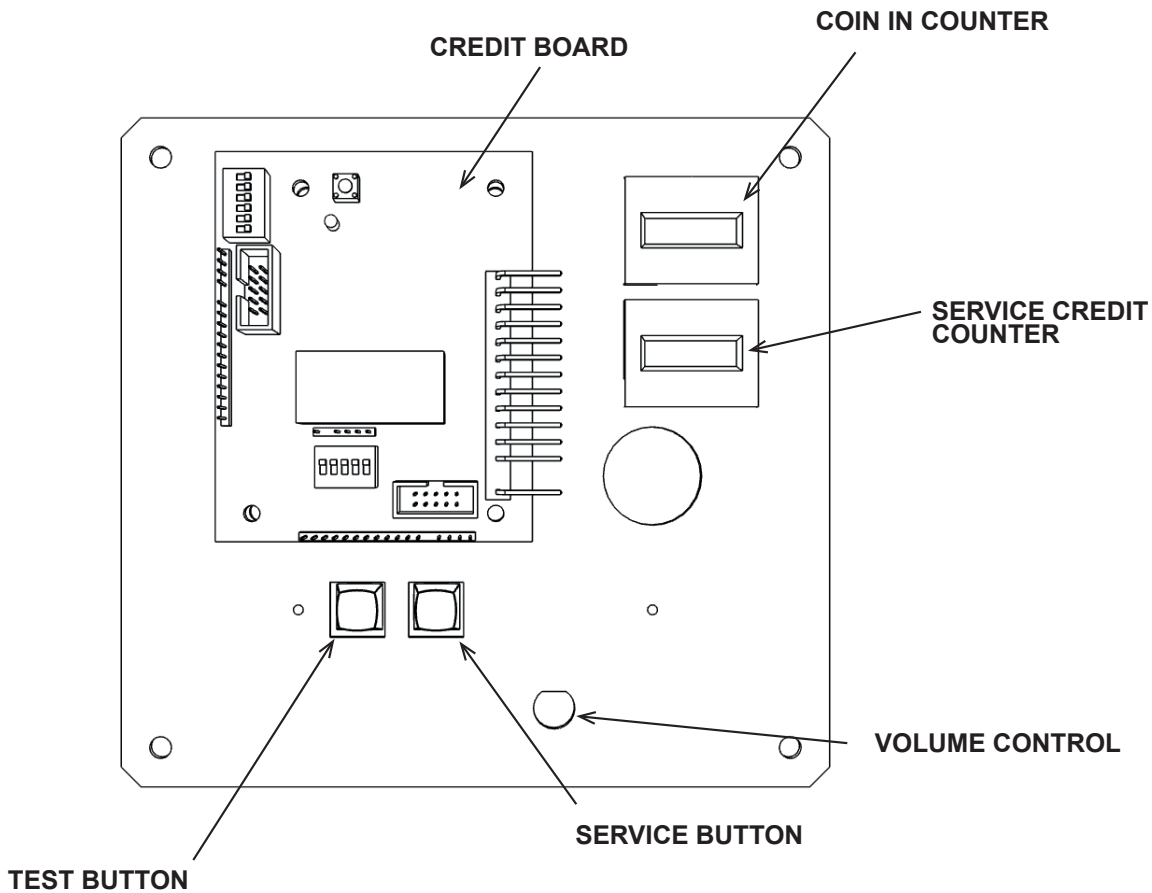
STOP IMPORTANT

- When you enter the Test Mode, Fractional Coin data is erased
- Adjust the sound to the optimum volume, taking into consideration the environmental requirements of the installation location
- Removing the Coin Meter circuitry renders the game inoperable
- Have a flashlight on hand and operate in Test Mode very carefully. The Cabinet interior is dark and narrow and you could easily make mistakes in operation

Perform tests and data checks periodically by manipulating the TEST Button and SERVICE Button in the Cabinet. Follow the instructions in this chapter to conduct checks when the game machine is first installed, when money is being collected, or when the game machine does not operate properly.

9-1 SWITCH UNIT AND COIN METER

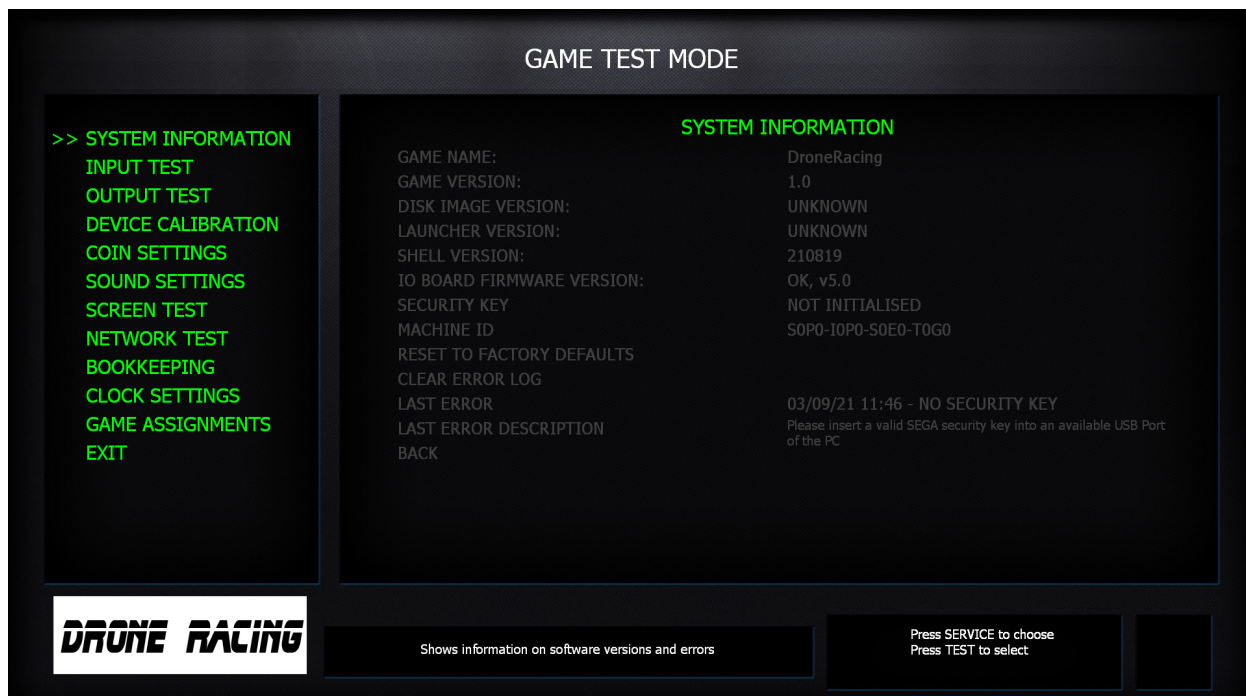
The SWITCH UNIT and COUNTERS are housed within the COIN TOWER. To access these controls you will need to open the COIN door. The switches and counters can be found directly on the rear face of the Tower.



DEVICE	FUNCTION
TEST BUTTON	Press to enter TEST MODE - Also used to enter choices selected within TEST MODE
SERVICE BUTTON	Press for SERVICE CREDIT - Also used to scroll through TEST MENUs
COIN IN COUNTER	Counts inserted coins (£0.10 or \$0.10 = 1 count)
SERVICE CREDIT COUNTER	Counts number of Service Credits taken
VOLUME CONTROL	Adjusts audio level

9-2 GAME TEST MODE

This is the main Test Mode menu. Here you can access a number of different sub menus to test different aspects of the Cabinet to ensure they are all working correctly.

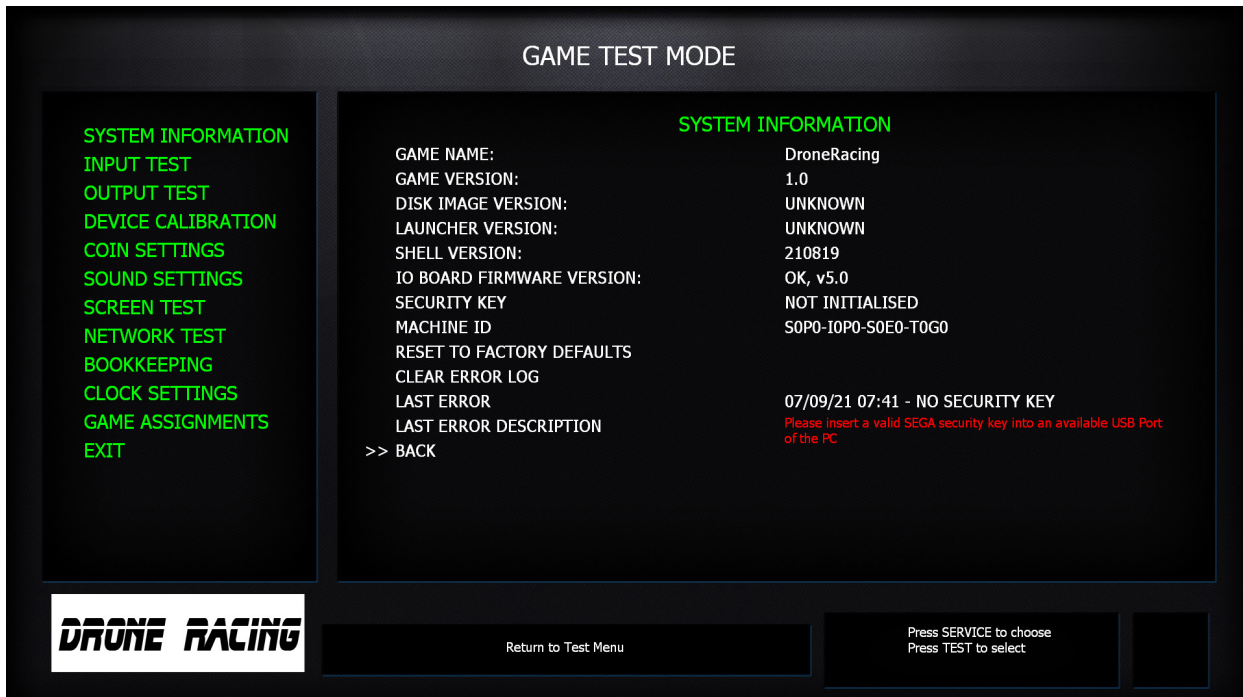


Use Service to cycle through items. Use Test to select an item and view that item's sub-menu. Select **EXIT** to return to Game.

System Information	Displays software and hardware version numbers
Input Test	Test all input devices like Buttons and Triggers
Output Test	Test all output devices like Speakers and LEDs
Device Calibration	Use this menu to calibrate any Control Units
Coin Settings	Tracks all Credit entries and change Coin to Credit ratio
Sound Settings	Test audio devices like speakers and woofers
Screen Test	Test all screen variables (brightness, contrast, alignment)
Network Test	Test Networking between Cabinets
Bookkeeping	See all Cabinet statistics
Clock Settings	Adjust Cabinet internal clock
Game Assignments	Adjust Game settings (difficulty, Kid Mode, subtitles etc)
Exit	Return to Game

9-3 SYSTEM INFORMATION

This menu displays information about the Cabinet specs and hardware.



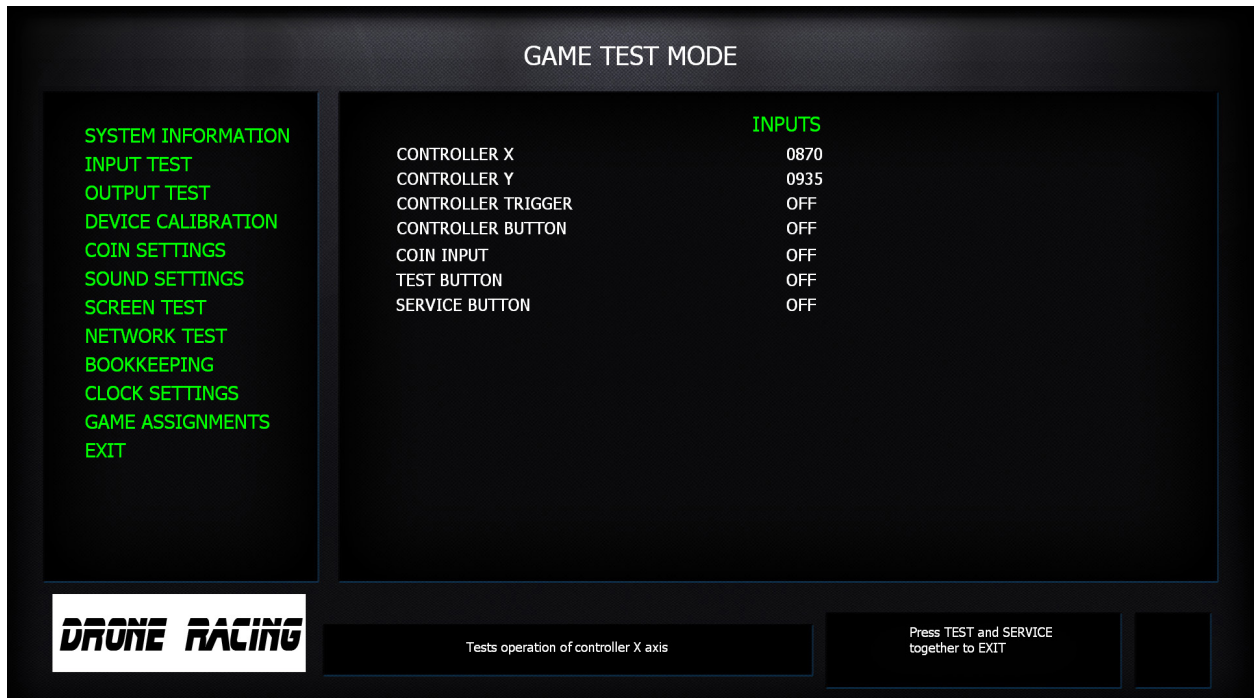
Use the Service button to cycle through the options and the Test button to select an option.

Game Name	Displays installed Game
Game Version	Displays version of Game
Disk Image Version	Displays Disk Image version
Launcher Version	Displays Launcher version
Shell Version	Displays Shell version
I/O Board Firmware Version	Displays I/O version
Security Key	Displays Security Key data
Machine ID	Displays unique ID every time Machine is rebooted
Reset to Factory Defaults	Restores all settings to predetermined defaults
Last Error	Records last error with accurate date and time
Last Error Description	Details last error correctly

9-4 INPUT TEST

This menu tests the input function of controllers and coin.

Note: Press the Test and Service Button together at the same time to exit this menu.



Controller X

Shows P1 Controller X value

Controller Y

Shows P1 Controller Y value

Controller Trigger

Shows when Controller Trigger is active

Controller Button

Shows when Controller Button is active

Coin Input

Shows when Coin is active in Coin Chute

Test Button

Shows when Test Button is pressed

Service Button

Shows when Service Button is pressed

9-5 OUTPUT TEST

This menu tests the output function of lighting, controllers, and speakers.



Controller Area

Operate lighting of Controller Area

Footwell Area

Operate lighting of Footwell Area

Edge/Back/Base

Operate lighting of Edge, Back, or Base Area

Monitor Lower Lamp

Operate lighting of Monitor Lower Lamp

Billboard

Operate Billboard Lighting

Controller Vibration

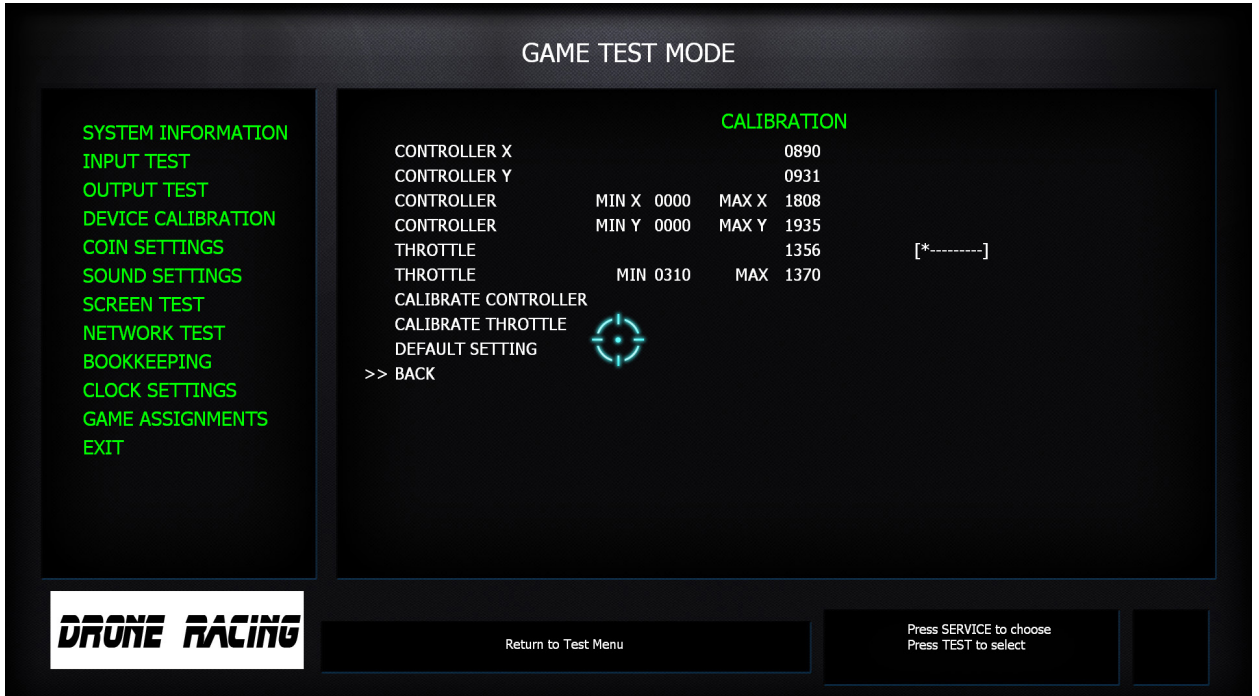
Test Controller Vibration

Back

Return to Main Menu

9-6 CALIBRATION TEST

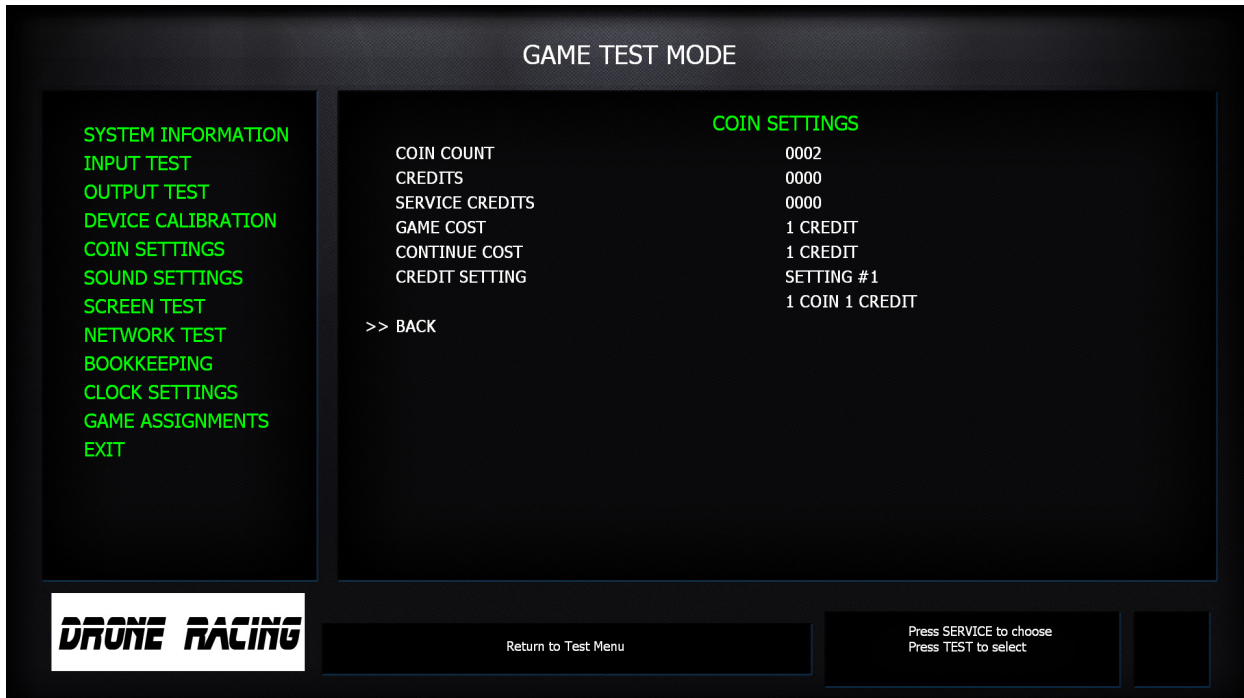
This menu allows you to calibrate the control units.



Controller X	Shows P1 Controller X axis position
Controller Y	Shows P1 Controller Y axis position
Controller Trigger Min/Max X	Shows Controller X values
Controller Trigger Min/Max Y	Shows Controller Y values
Throttle Min/Max X	N/A
Throttle Min/Max Y	N/A
Calibrate Controller	Executes Controller calibration routine
Default Setting	Revert to default values

9-7 COIN TEST

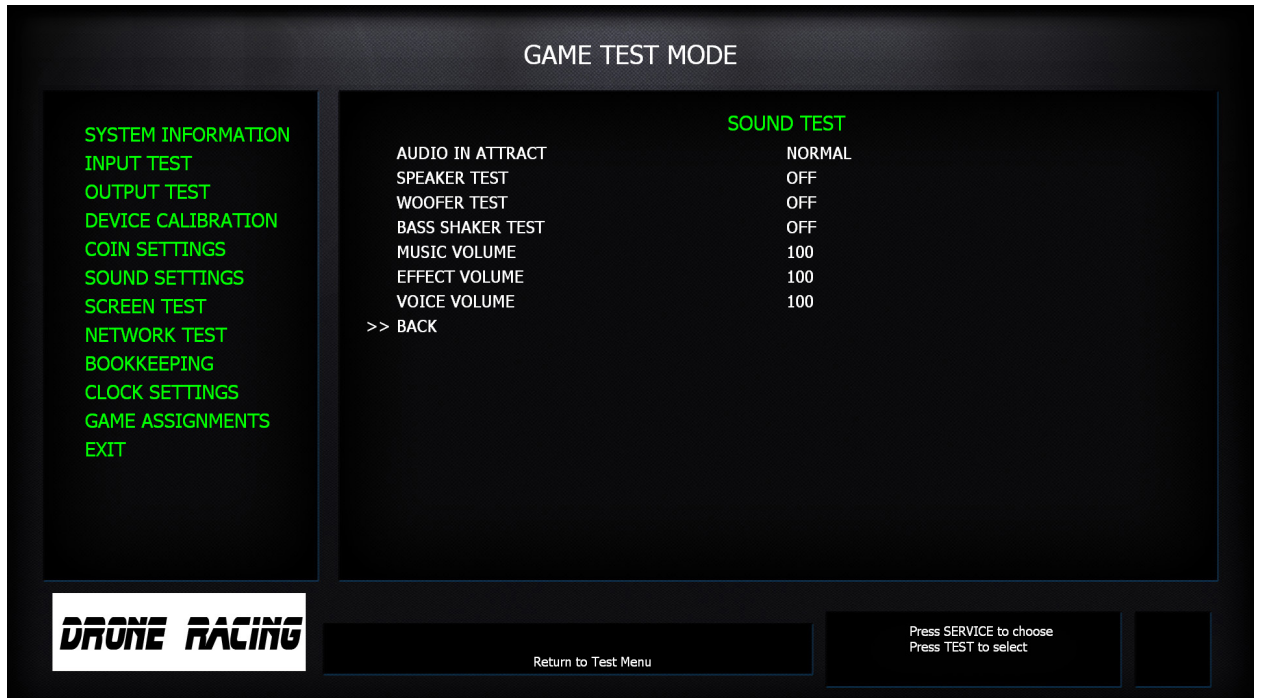
This menu allows you to see the total amount of credits and set the coin to credit ratio.



Coin Count	Number of inserted coins
Credits	Amount of Standard Credits
Service Credits	Amount of Service Credits
Game Cost	Sets price of Game
Continue Cost	Sets price of Continue Play
Credit Setting	Set Coin to Credit Ratio:
CS1	1 Coin 1 Credit
CS2	1 Coin 2 Credits
CS3	1 Coin 3 Credits
CS4	1 Coin 4 Credits
CS5	1 Coin 5 Credits
CS6	2 Coins 1 Credit
CS7	3 Coins 1 Credit
CS8	4 Coins 1 Credit
CS9	5 Coins 1 Credit
CS10	Freeplay

9-8 SOUND TEST

This menu allows you to test the speaker, woofer, and bass shaker. You can also set the volume level for the attract mode.



Audio in Attract

Set audio level when playing attract mode

Speaker Test

Test Cabinet Speakers

Woofer Test

Test Woofer operation

Bass Shaker Test

Test Bass Shaker operation

Music Volume

Adjust Music Volume

Effect Volume

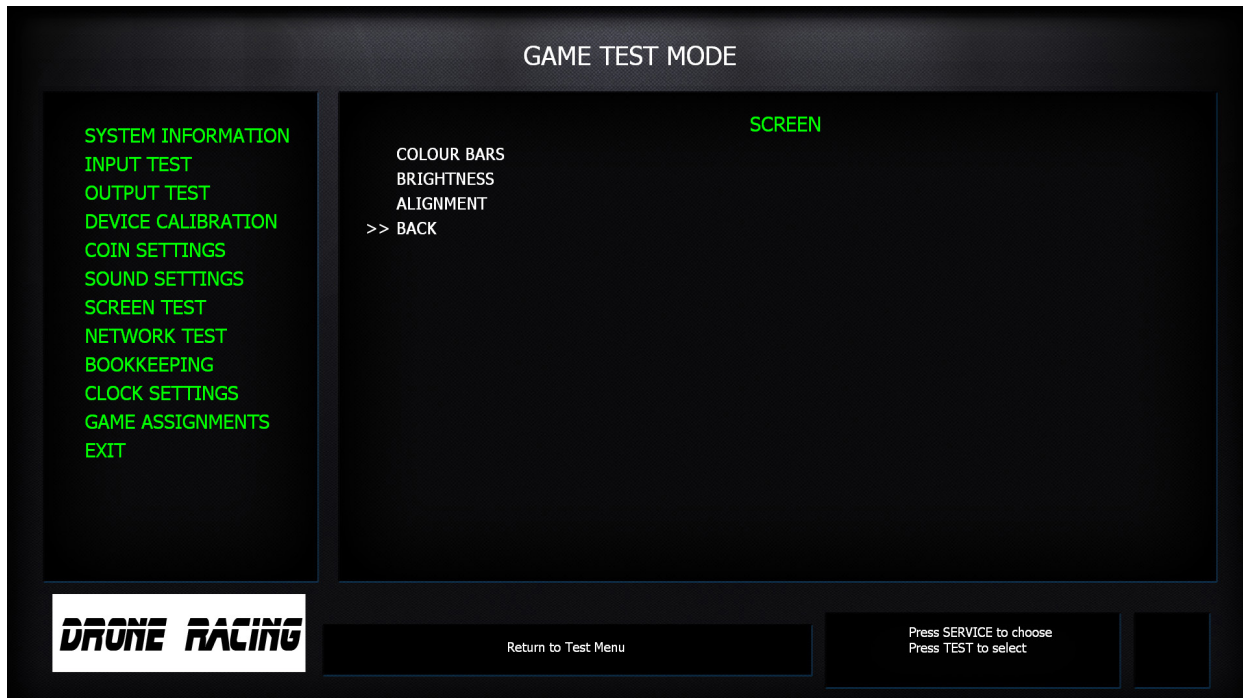
Adjust Volume of in-game SFXs

Voice Volume

Adjust Volume of voice lines in-game

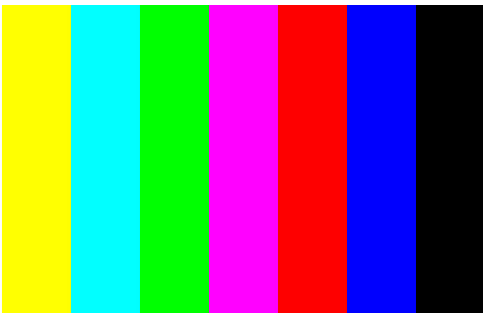
9-9 SCREEN TEST

This menu allows you to adjust the screen variables like brightness and colour.



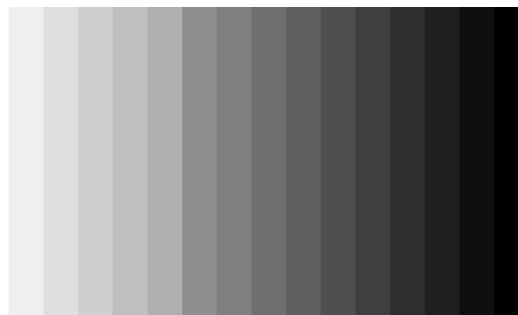
Colour Bars:

Selecting this will display the following screen:



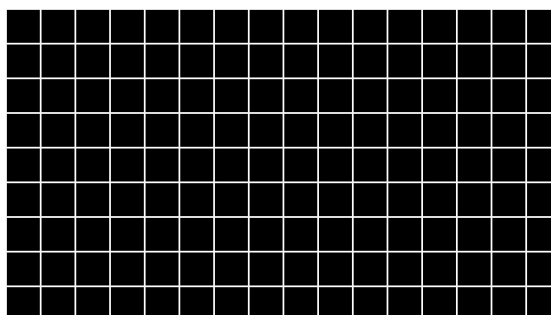
Brightness:

Selecting this will display the following screen:



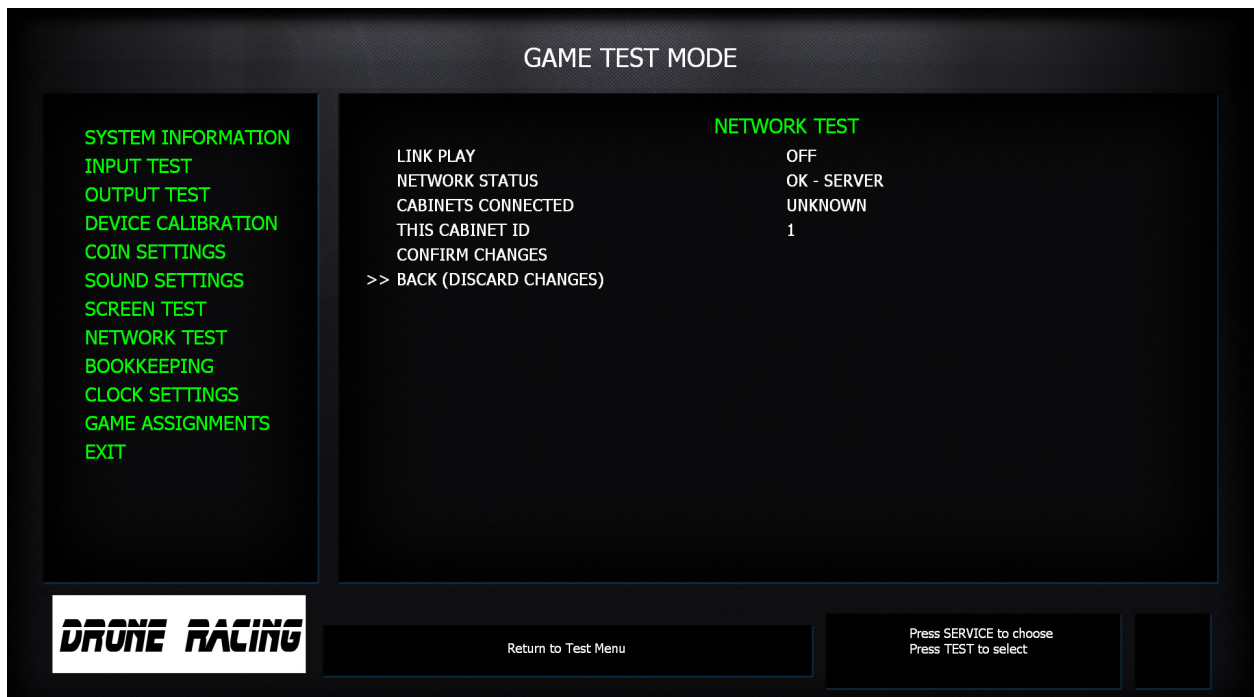
Grid Alignment:

Selecting this will display the following screen:



9-10 NETWORK TEST

These menus allow you to test Cabinet networking



Link Play

Shows if Link Play is enabled (connected Cabs can still be isolated for Single Play)

Network Status

Shows if Cab is successfully linked

Cabinets Connected

Shows the number of connected Cabs

This Cab ID

Displays Cab ID Number

Confirm Changes

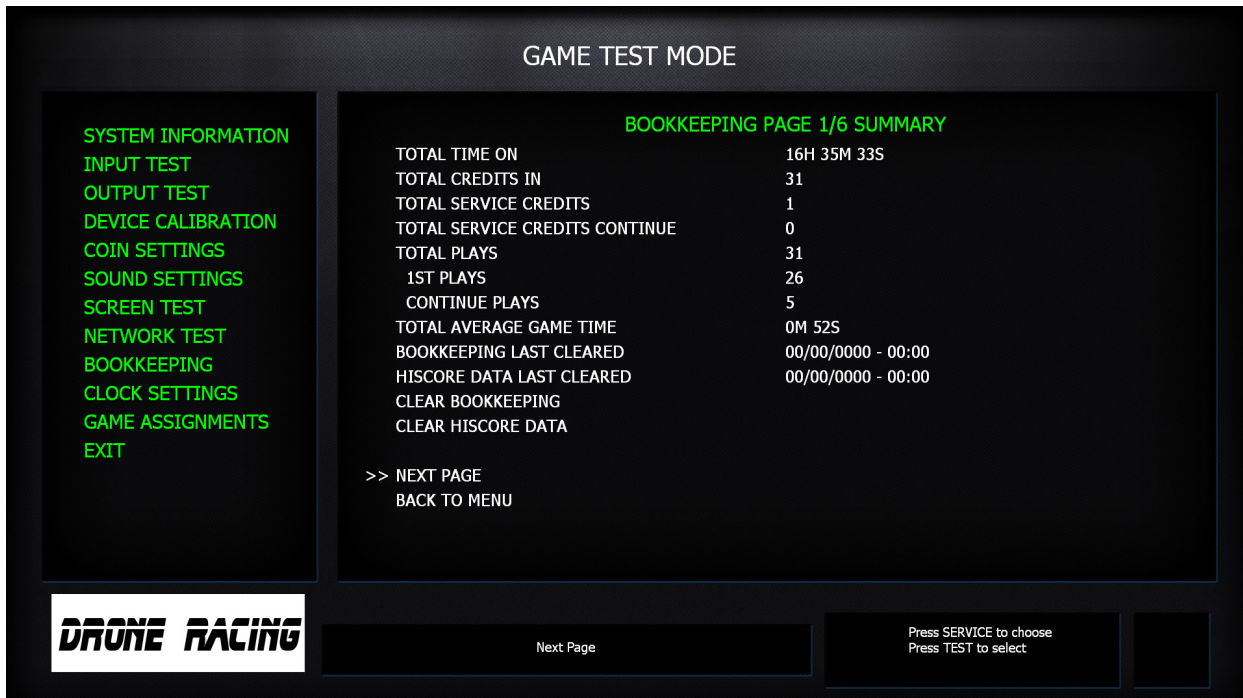
Confirm any amended changes

Back (Discard Changes)

Exit Menu without confirming changes

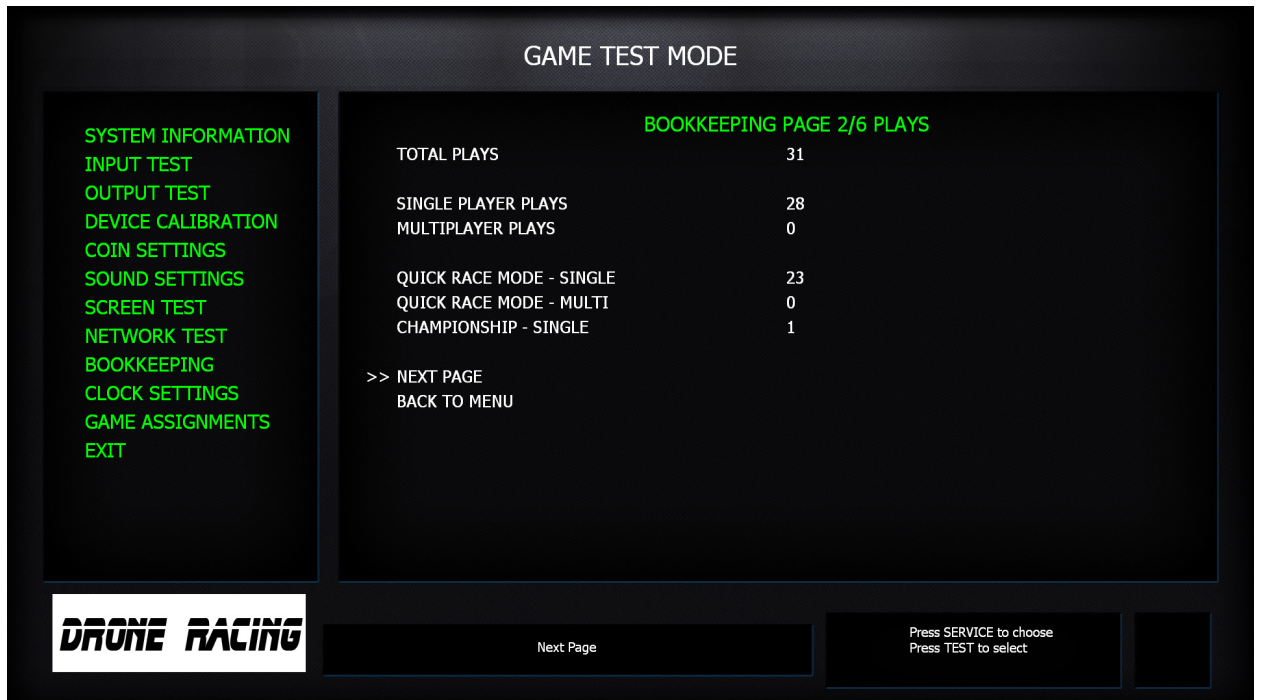
9-11 BOOKKEEPING

These menus allow you to see Cabinet metrics and statistics.



Total Time On	Total Time Cabinet has been Powered On
Total Credits In	Total Number of Standard Credits
Total Service Credits	Total Number of Service Credits
Total Plays	Total Number of full completed Races
1st Plays	Total Plays from Attract
Continue Plays	Total Number of Continues
Total Average Game Time	Average time of played game
Bookkeeping Last Cleared	Time stamp of when BK was last cleared
Hiscore Last Cleared	Time stamp of when HS were last cleared
Clear Bookkeeping	Clears all BK stats (requires confirmation)
Clear Hiscore Data	Clears of HS stats (requires confirmation)
Next Page	Proceeds to Next Page
Back to Menu	Return to Main Test Menu

This menu shows the total number of plays in each mode.



Total Plays

Single Player Plays

Multiplayer Plays

Quick Race Mode - Single

Quick Race Mode - Multi

Championship - Single

Next Page

Back to Menu

Total number of plays

Total number of Single Player plays

Total number of Multiplayer plays

Total number of Single Player Quick Races

Total number of Multiplayer Quick Races

Total number of Championship Races

Proceed to Next Page

Return to Main Menu

This menu shows the average game time for each mode.



Av Game Time - Quick Race Single

Average time for QR Single

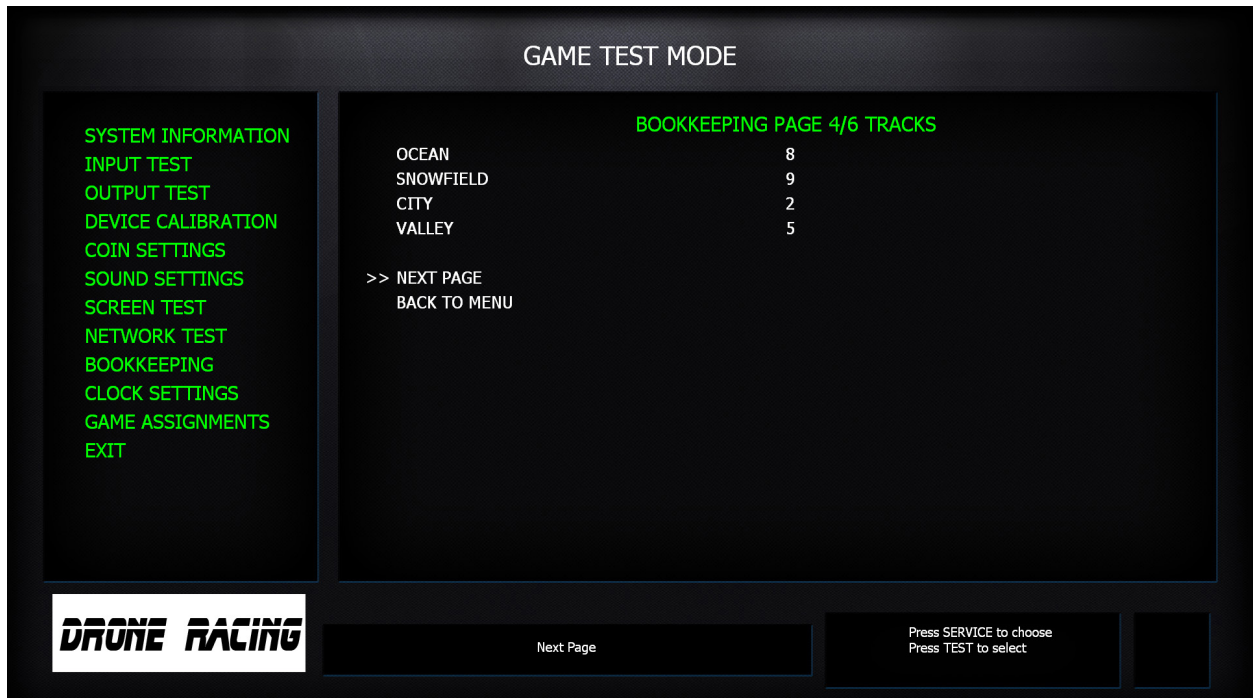
Av Game Time - Quick Race Multi

Average time for QR Multi

Av Game Time - Championship

Average time for Championship

This menu shows the amount of times tracks have been played.



Ocean

No of times track has been played

Snowfield

No of times track has been played

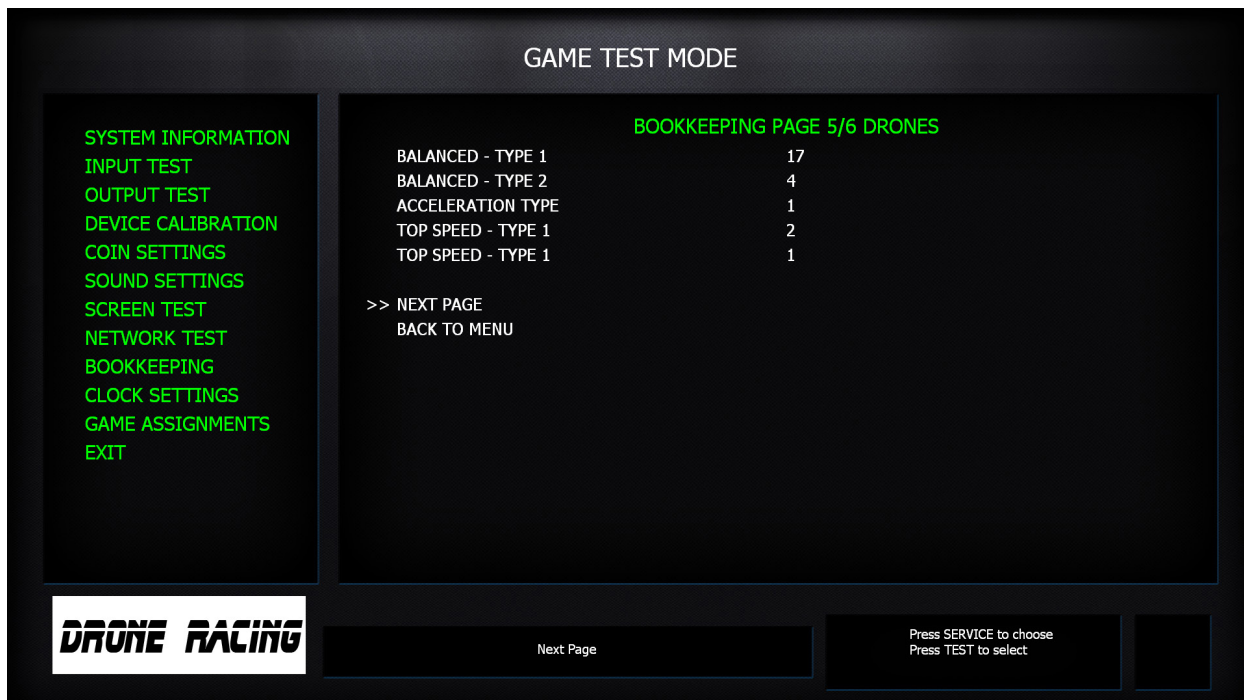
City

No of times track has been played

Valley

No of times track has been played

This menu shows the amount of times Drones have been used.



Balanced - Type 1

No of times Drone has been used

Balanced - Type 2

No of times Drone has been used

Acceleration Type

No of times Drone has been used

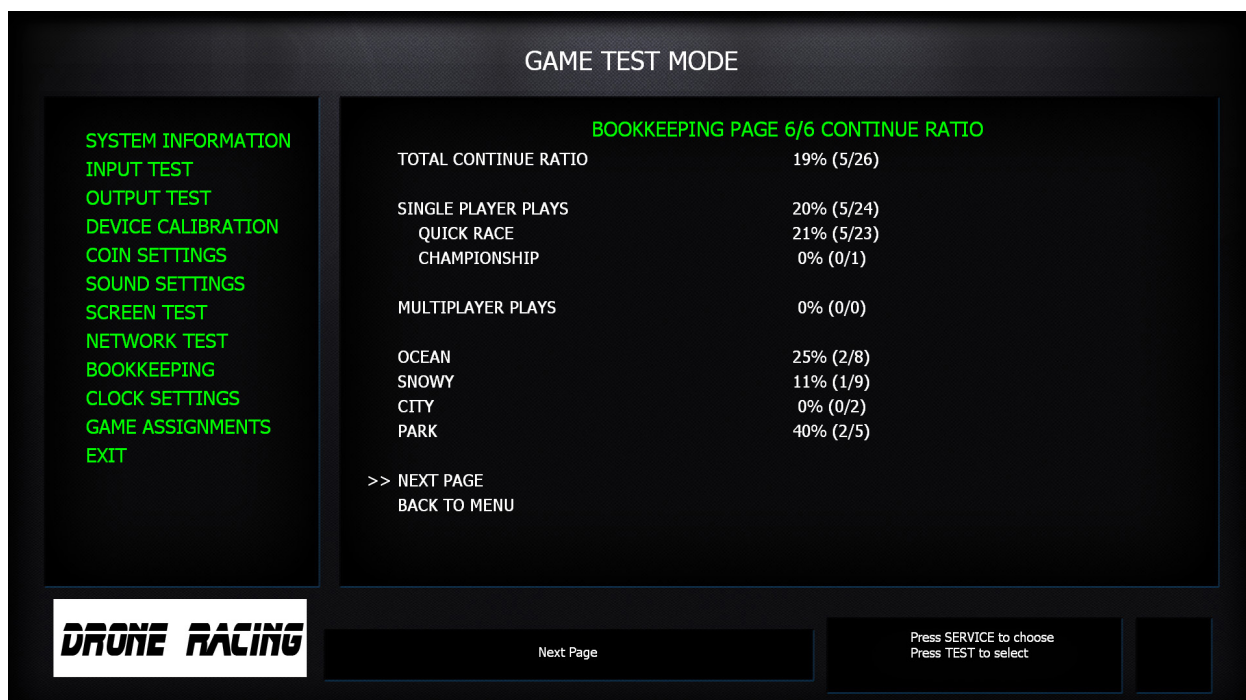
Top Speed - Type 1

No of times Drone has been used

Top Speed - Type 2

No of times Drone has been used

This menu shows the Continue Ratios for each game type.



Total Continue Ratio

% of total Players that use Continue

Single Player Races

% of players that use Continues in this Game Mode

Quick Race

% of players that use Continues in this Game Mode

Championship

% of players that use Continues in this Game Mode

Multiplayer Races

% of players that use Continues in this Game Mode

Ocean

% of players that use Continues in this Game Mode

Snowy

% of players that use Continues in this Game Mode

City

% of players that use Continues in this Game Mode

Park

% of players that use Continues in this Game Mode

Next Page

Proceed to First Page

Back to Menu

Return to Main Menu

9-12 CLOCK TEST

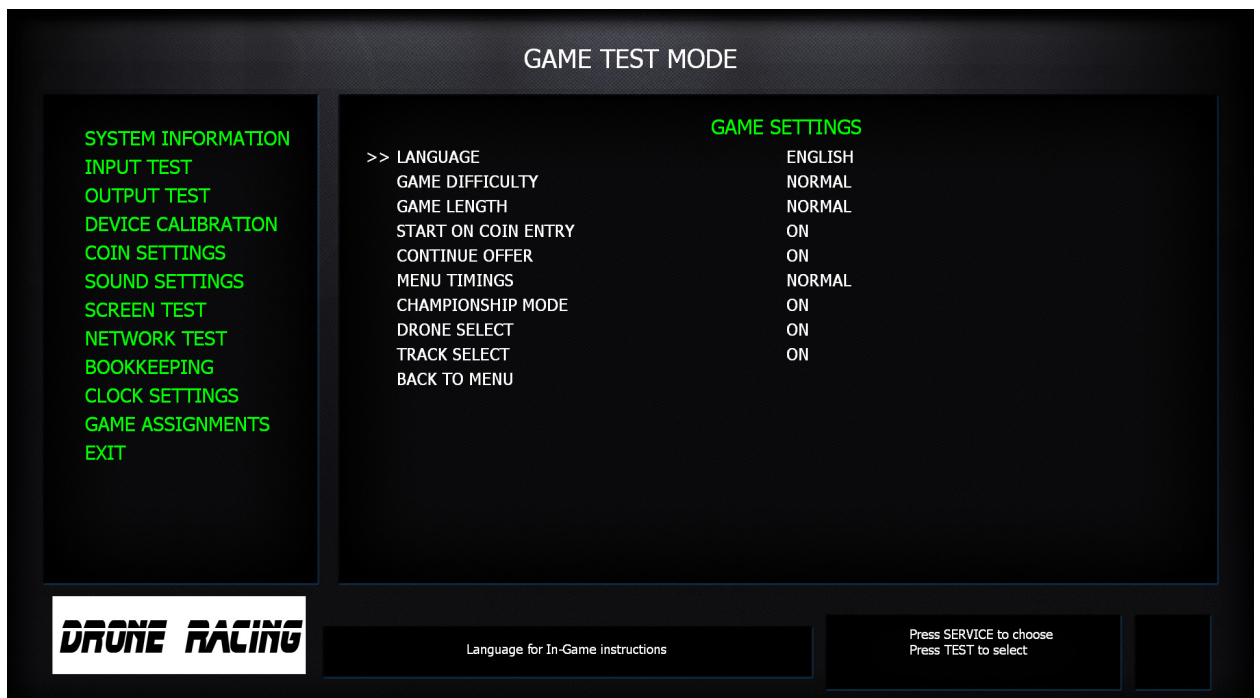
This menu allows you to set the internal Cabinet clock.



Current Time	Displays current time
Current Date	Displays current date
Year	Adjusts year
Month	Adjusts month
Date	Adjusts date
Hour	Adjusts hour
Minute	Adjusts minute
Second	Adjusts second

9-13 GAME ASSIGNMENTS

This menu allows you to adjust gameplay variables like language and difficulty.



Language

Changes Game Language

Game Difficulty

Sets Game difficulty

Game Length

Sets number of laps

Start on Coin Entry

Sets whether Game begins upon Coin insertion

Continue Offer

Sets whether Game offers Continue

Menu Timings

Sets timings for Menu choices

Championship Mode

Sets whether Championship Mode is enabled

Drone Select

Sets whether player can select their Drone

Track Select

Sets whether player can select a track to play

10 VIDEO DISPLAY

CAUTION

The LCD display screen is adjusted prior to leaving the factory.
Avoid any unnecessary adjustment

IMPORTANT

- If the adjustment method in this Manual does not resolve the problem, contact the customer service number in this Manual or your supplier
- Do not stick tape, stickers or anything else onto the screen. Any kind of adhesive may damage the surface of the screen

10-1 GENERAL DESCRIPTION

This specification applies to the 43.0 inch Color TFT-LCD Module P430HVN01.4. This LCD module has a TFT active matrix type liquid crystal panel 1920x1080 pixels, and diagonal size of 43.0 inch. This module supports 1920x1080 resolution display. Each pixel is divided into Red, Green and Blue sub-pixels or dots which are arranged in vertical stripes. Gray scale or the brightness of the sub-pixel color is determined with a 10-bit gray scale signal for each dot.

The P430HVN01.4 has been designed to apply the 10-bit 2 channel LVDS interface method. The main feature of P430HVN01.4 would be high brightness, high contrast, wide viewing angle, high color saturation, symmetry narrow bezel, edge LED backlight and high color depth.

* General Information

Items	Specification	Unit	Note
Active Screen Size	43.0	Inch	
Display Area	1018.08(H) x 572.67(V)	mm	
Outline Dimension	1044.08(H) x 598.67(V) x 9.9(D)	mm	1
Driver Element	a-Si TFT active matrix		
Display Colors	10 bit (8bit+FRC), 1073.7M	Colors	
Number of Pixels	1920x1080	Pixel	
Pixel Pitch	0.53025 (H) x 0.53025(W)	mm	
Pixel Arrangement	RGB vertical stripe		
Display Operation Mode	Normally Black		
Display Orientation	Landscape/Portrait Enable		
Surface Treatment	AG	Haze = 11%	

Note:

(1) Dmax: 26.5mm (Front bezel to Driver cover); Dmin: 9.9mm (Front bezel to Bezel back)

10-2 CLEANING THE SCREEN

CAUTION

- Since the LCD display screen is susceptible to damage, pay careful attention to its handling. When cleaning, refrain from using water or volatile chemicals
- Do not climb onto the control panel. This could lead to injuries, such as bumping your head
- When reaching across the control panel to clean the screen there is a risk of hurting your shoulder or arm. Use a mop with a non-feathery, soft, dry cloth mop head and wipe the surface of the screen

When the screen surface becomes dirty, clean it by using a soft cloth such as gauze. When water, and volatile chemicals such as benzene, thinner, etc., spill on the screen surface, it may be subject to damage. Therefore, do not use them.

Also, since the surfaces are susceptible to damage, refrain from rubbing them with a hard material or using a duster. If the screen is especially dirty, call in a professional cleaner.

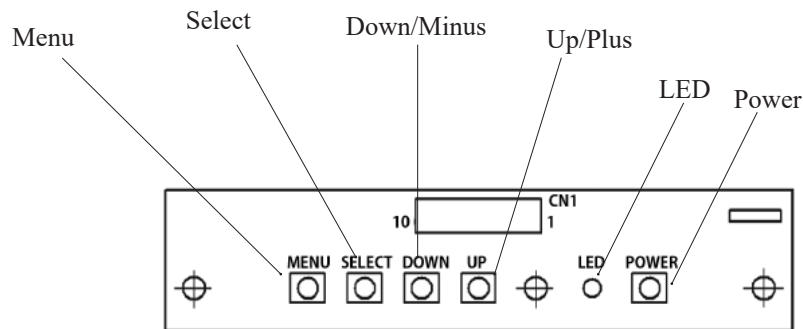
10-3 ON SCREEN ADJUSTMENT METHOD (OSD)

STOP IMPORTANT

- If the adjustment method in this Manual does not resolve the problem contact the customer service number in this Manual or your supplier
- Do not stick tape, stickers or anything else onto the screen. Any kind of adhesive may damage the surface of the screen
- The screen has been finely adjusted prior leaving the factory. Do not unnecessarily adjust the screen

OSD (On Screen Display)

The OSD offers the user various possibilities of customizing the appearance of the TFT display. By using the OSD Board, brightness, contrast, input selection, OSD appearance and much more can be adjusted easily.



OSD BOARD

Operation and Buttons

Item	Description
Menu	Enter OSD main menu Leave sub menu Leave OSD main menu
Select	Navigate down in menu
Down/Minus	Navigate left in main menu Decrease value
Up/Plus	Navigate right in main menu Increase value
Power	Turn power on/off
2 colour LED	Red/Green

Hot Keys

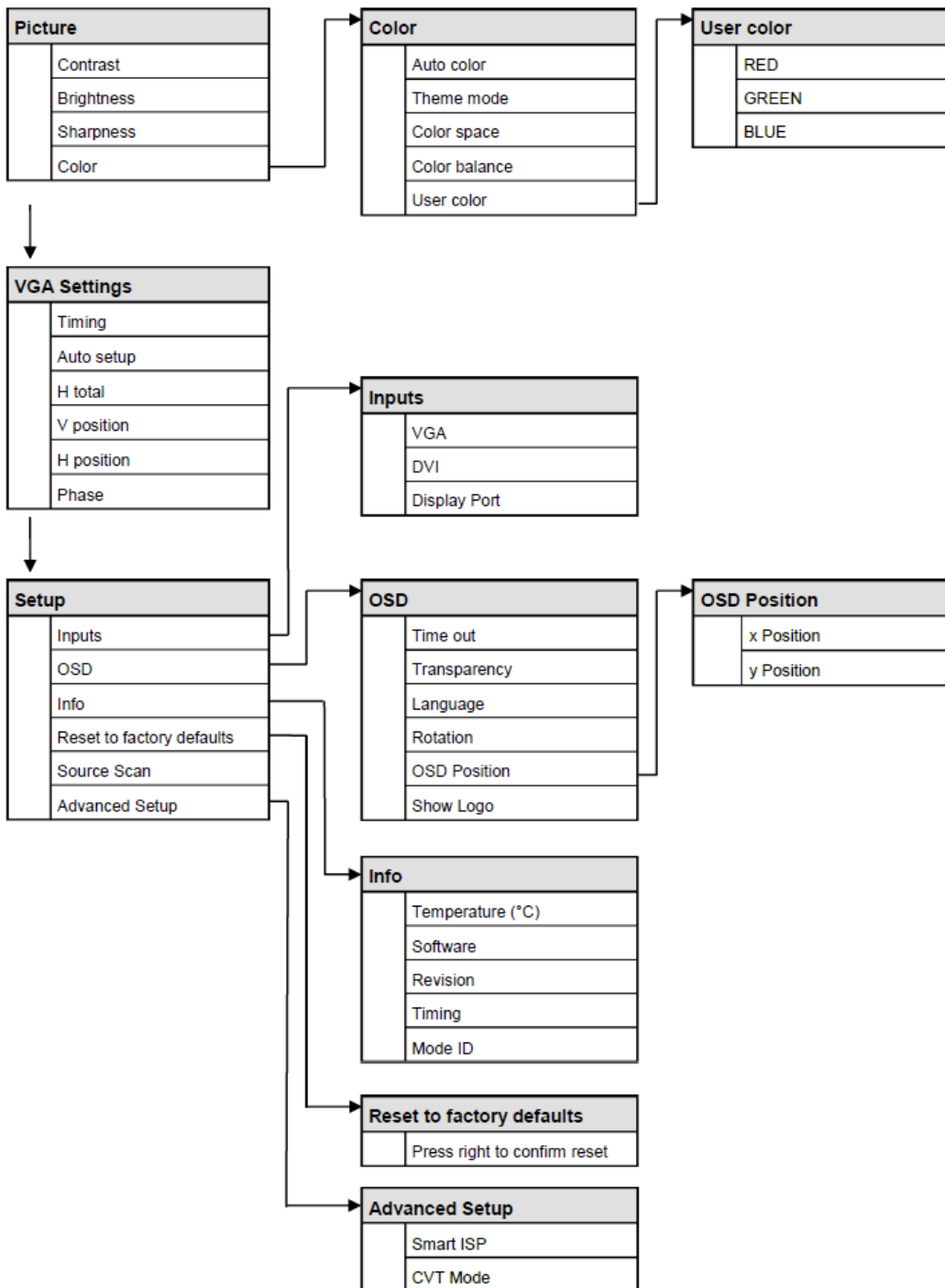
The OSD offers hot key functions. To access these functions the user must not open the OSD via the Main Menu. The hotkey functions offer direct access to each equivalent function.

Button	Direct access
Up/Plus	Source select, switch to next input
Down/Minus	Brightness
Select	Auto adjust

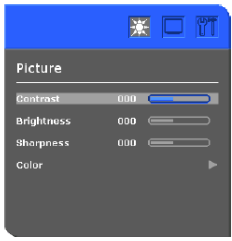
OSD Status LED

Condition	Description
Amber flashing	Standby (Searching Input)
Green flashing	Searching display mode (Source)
Green ON	OK (Displaying signal)
Red ON	Power off

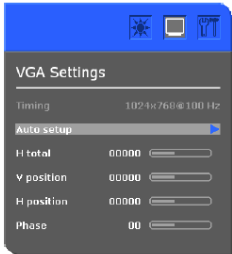
OSD Structure




Picture Menu

	Picture	Contrast
		Brightness
		Sharpness
		Color

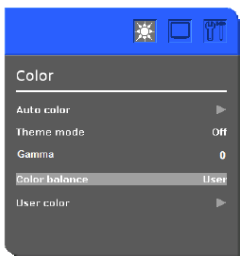
VGA Settings Menu

	VGA Settings	Timing
		Auto setup
		H total
		V position
		H position
		Phase


Setup Menu

	Setup	Inputs
		OSD
		Info
		Reset to factory defaults
		Source scan
		Advanced Setup

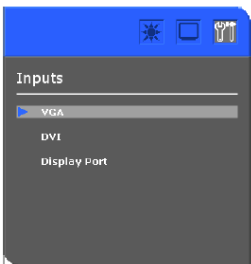
Colour Menu

	Color	Auto color
		Theme mode
		Gamma
		Color balance
		User color

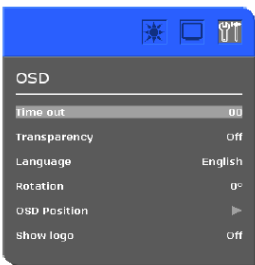
User Colour Menu

	User color	RED
		GREEN
		BLUE


Input Menu

	Inputs	VGA
		DVI
		DisplayPort


OSD Menu

	OSD	Time out
		Transparency
		Language
		Rotation
		OSD Position
		Show logo

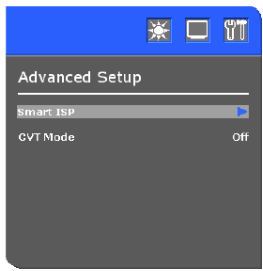
OSD Position Menu

	OSD Position	x Position
		y Position

Info Menu

	Info	Temperature (°C)
		Software
		Revision
		Timing
		Mode ID

Advance Setup Menu

	Advanced Setup	Smart ISP
		CVT Mode

11 CONTROLLER UNIT

WARNING

- When working with the product, be sure to turn the power off. Working with the power on may cause an electric shock or short circuit
- Be careful not to damage the wires. Damaged wires may cause an electric shock, short circuit or present a risk of fire
- Exercise due caution in performing soldering work. If soldering iron is handled carelessly, there could be fires or burns

CAUTION

- When fastening plastic parts, be careful not to tighten screws or nuts excessively. If these are tightened to excess, parts could be damaged, resulting in injuries from fragments, etc.
- After the unit has been disassembled and reassembled again, check carefully to be sure that there are no gaps or rattling at the junctions and that the trigger can be operated smoothly. If there are gaps or rattling, or if operation is not satisfactory, the players could get fingers or hands caught, resulting in injury
- Be sure to inspect control unit surfaces for cracks and damage. Players could be injured if they play when the unit is cracked or damaged
- Assemble so that there is no gap between the L and R covers. If there is a gap or rattling, the players could get fingers or hands caught, resulting in injury

IMPORTANT

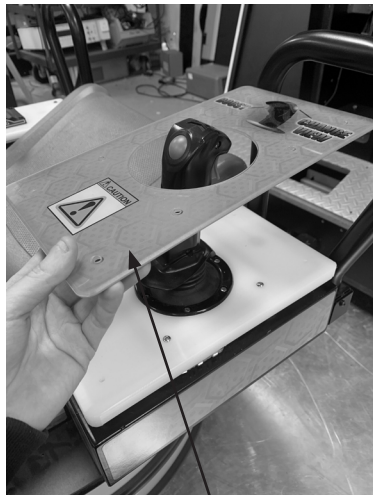
- There is a possibility that the electronic components on the IC Board may be prone to damage by static electricity. Please make sure to discharge any build up of static electricity from your body prior commencing any work
- Power OFF machine before commencing any work

11-1 REMOVING THE JOYSTICK CONTROLLER

- 1 Turn power to the Cabinet OFF
- 2 Remove the (4) securing fixings around the Joystick Controller



- 3 Remove the artwork plate and lighting panel by lifting them over the top of the Joystick Controller



Artwork Panel

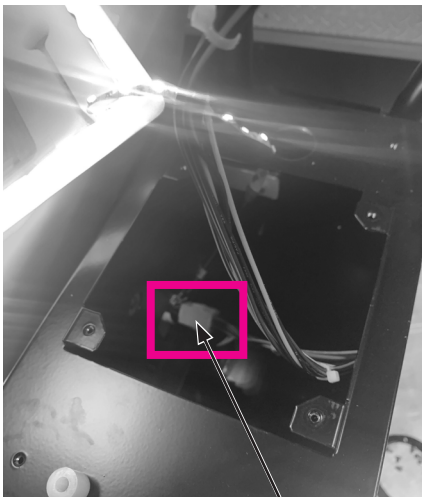


Lighting Panel

-
- 4** Carefully lift the Joystick Assembly out of the Mount Joystick, taking care not to trap or damage any wire harnesses or parts



-
- 5** Disconnect the harness that connects the Joystick Controller to the Seat Cab



Joystick Harness

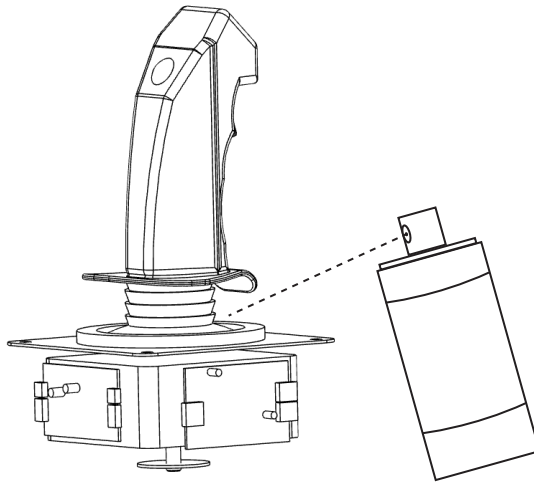
-
- 6** The Joystick Controller can now be safely removed

11-2 GREASING

STOP IMPORTANT

Use only the specified grease. Using any other kind of grease can result in damage to parts

Once every three months, apply grease to the gear contacts and spring parts.
Use white lubricant, lithium spray grease .



12 COIN HANDLING

Handling the Coin Jam

If the coin is not rejected when the REJECT button is pressed, open the coin chute door and open the selector gate. After removing the jammed coin, put a normal coin in and check to see that the selector correctly functions.

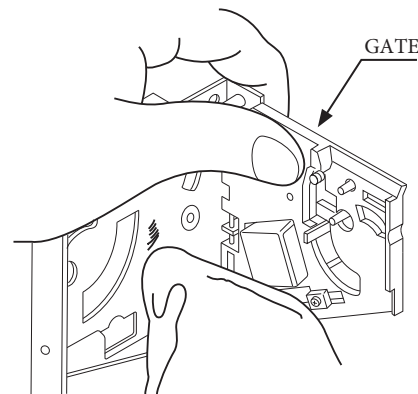
12-1 CLEANING THE COIN SELECTOR

STOP IMPORTANT

- Remove and clean smears by using a soft cloth dipped in water or diluted chemical detergent and then squeezed dry
- Never apply machine oil, etc. to the Coin Selector
- After cleaning the Coin Selector, insert a regular coin in the normal working status and ensure that the selector correctly functions

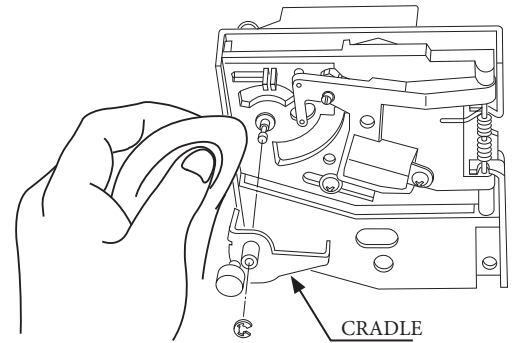
The Coin Selector should be cleaned once every 3 months.
When cleaning, follow the procedure below:

- 1 Turn the power for the machine OFF. Open the Coin Chute Door
- 2 Remove the Coin Selector from the Coin Chute Door
- 3 Open the gate and dust off by using a soft brush (small soft Paint Brush, etc.)



CLEANING THE COIN SELECTOR (MECHANICAL)

- 1 Remove and clean smears by using a soft cloth dipped in water or diluted chemical detergent and then squeezed dry.
- 2 Remove the CRADLE. When removing the retaining ring (E ring) be very careful so as not to bend the rotary shaft.
- 3 Remove stain from the rotary shaft and shaft receiving portions by wiping off with a soft cloth, etc.
- 4 After wiping off as per previous step, further apply a dry cloth to completely dry the Coin Selector.



Coin Insertion Test

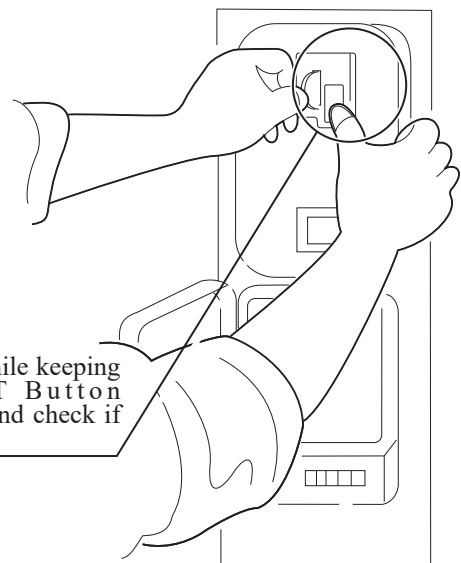
Once every month, when performing the Coin SW Test, simultaneously check the following:

Does the Coin Meter count satisfactorily?

Does the coin drop into the cashbox correctly?

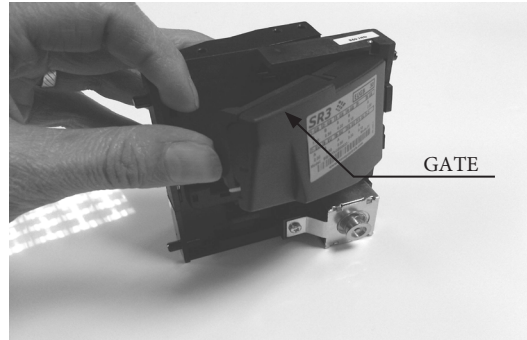
Is the coin rejected when inserted while keeping the REJECT Button pressed down?

Insert a coin while keeping the REJECT Button pressed down and check if it is rejected.

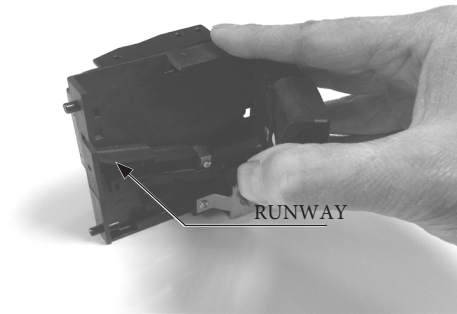


CLEANING THE COIN SELECTOR (SR3 / NRI)

- 1** Remove and clean smears by using a damp soft cloth dipped in water. DO NOT use any diluted chemical detergent or cleansing agent as this will impair the workings of the component.



- 2** Open the reject gate to gain access to the rundown path.



- 3** Remove the dirt and stains from the runway by wiping off with a soft damp cloth.



- 4** After wiping off as per previous step, further apply a dry cloth to completely dry the coin Selector.

12-2 FAULT FINDING

Fault Finding

The following information is presented for customers' guidance in rectifying a fault but does not cover all possible causes.

All acceptors with electronic faults should be returned to an approved service centre for repair.

SYMPTOM	INVESTIGATE	POSSIBLE CAUSE
Acceptor does not work (all coins reject)	Connector	Poor Contact
		Loose Wire
	Power Supply	Not switched on
		Incorrect voltage
		Inadequate current
		Rise time too slow
		Accepter Inhibited
	Inhibit all inputs	Acceptor Inhibited
	Accept gate	Gate not free or dislocated
	Accept channel	Obstruction
	Reject gate	Not fully closed
	LED on rear cover RED	EEPROM chksm error
		SR Sensor fault
Credit opto fault		
Credit sensor blocked		
Reject lever pressed		
LED on rear cover YELLOW	Reinstall power	
Poor Acceptance	Power Supply	Voltage less than 10v (Voltage drops when coil engages)
	Accept gate	Gate jam or dislocated
	Connector	Loose
	Coin rundown	Dirty
	Bank Select	Both banks enabled
Coin stick or jam in acceptor	Accept channel	Acceptor dirty or may have some damage
	Accept gate	
	Reject gate	
A true coin type rejects	Label	Coin not programmed
No accept signal	Connector	Loose or broken wire
	Accept channel	Path dirty or obstructed

12-3 ADJUSTING THE PRICE OF PLAY (EXCEL)

STOP IMPORTANT

- The price of play is determined by the configuration of switches located on either the EXCEL or VTS board. The type of board used is determined by product location. Switch settings for both types of board remain the same

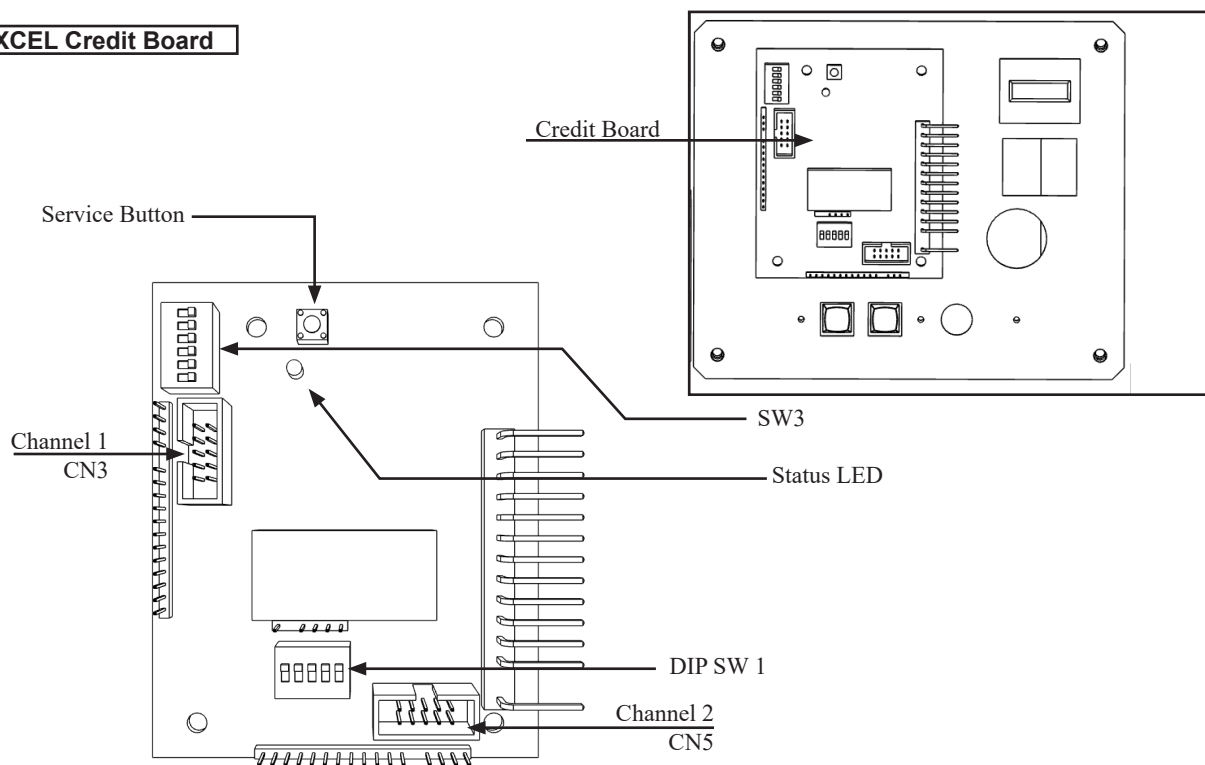
This product comes equipped with a Crane NRI Coin Acceptor. To adjust the price of play ALL CREDIT SETTINGS are adjusted via the EXCEL CREDIT BOARD.

IMPORTANT!

The CREDIT SETTINGS within the SYSTEM TEST MODE must be set to 1 Coin 1 Credit to allow the CREDIT BOARD to function correctly.

The CREDIT BD has a built in accumulator. This is controlled by 2 DIL Switches. These allow the operator to select the price of play, type of coin acceptor and region.

EXCEL Credit Board



DIL SW3 (Regional Settings)

Adjust these switches to specify the type of Coin Acceptor used and currency.

Default = SW1&SW2 ON - SR3/NRI in parallel mode, Sterling.

SERVICE BUTTON

Provides a SERVICE CREDIT when pressed

Status LED

Flashes when functioning.

CHANNEL 1

To Coin Acceptor (SR3 TYPE.)

DIL SW1 (credit settings)

Adjust to required price of pay.

VOL CONTROL

MAIN VOLUME ADJUSTMENT (FRONT SPEAKERS)

12-4 COIN REGION & PRICE OF PLAY SETTINGS

Credit Board Mode Settings Switch 3																			
Country	Setting	Switch 3 Setting					Coin Validator Programming												
		SW1	SW2	SW3	SW4	SW5	SW6	COIN1	COIN2	COIN3	COIN4	COIN5	COIN6	COIN7	COIN8	COIN9	COIN10	COIN11	COIN12
UK	Coin Controls	OFF	OFF	OFF	OFF		£1	50p new	20p	10p	-	50p old	-	-					
UK	C220 Parallel	ON	OFF	OFF	OFF		£1	50p new	20p	10p	-	50p old	-	£2					
UK	Coin Controls	OFF	OFF	OFF	OFF		£1	50p new	20p	10p	-	£2	-	50p old					
UK	C220 Binary	ON	ON	OFF	OFF		£1	50p new	20p	10p	-	£2	-	50p old					
UK	Coin Controls	ON	ON	OFF	OFF		£1	50p new	20p	10p	-	£2	-	50p old					
UK	SR3 Parallel	OFF	OFF	ON	OFF		£2	£1	50p new	20p	10p	-	-	50p old					
Euro	SR3 Parallel	ON	OFF	ON	OFF		€2	€1	50¢	20¢	10¢	-	-	-					
UK	Mars MEMS 111 Parallel	ON	OFF	ON	OFF		£1	£2	20p	10p	50p new	50p old							
UK	NRI Parallel	OFF	ON	ON	OFF		10p	20p	50p	£1	£2	-							
Belgium	Parallel	ON	ON	ON	OFF		-	50Bfr	20Bfr	5Bfr									
Holland	Parallel	OFF	OFF	OFF	ON		-	5NLG	2.5NLG	1NLG									
Austria	SR3 Parallel	ON	OFF	OFF	ON		20Sch	10Sch	5Sch	1Sch									
Spain	Coin Controls	OFF	ON	OFF	ON		500Pta	200Pta	100Pta	50Pta	25Pta	200Pt old	50Pta old	25Pta old					
Spain	C220 Binary	ON	ON	OFF	ON		500Pta	200Pta	100Pta	50Pta	25Pta	200Pta old	50Pta old	200Pta old					
Spain	SR3/NRI Parallel	ON	ON	OFF	ON		500Pta	200Pta	100Pta	50Pta	25Pta	-	-	200Pta old					
Spain	Coin Controls	OFF	OFF	ON	ON		100Pta	50Pta	-	25Pta new	-	50Pta old	-	25Pta old					
Portugal	C220 Parallel	ON	OFF	ON	ON		200Es	100Es	50Es	-	-	-	-	-					
Euro	Parallel	ON	OFF	ON	ON		€1	50¢	50Es	-	-	-	-	-					
	TBA				OFF		TBA												
	Channels					ON	TBA												
						OFF	Direct Mode												
						ON	2 channel Mode												

Note: These switch settings are under constant review and may change due to world currency updates.

Set SW 1 according to the option settings found in the relevant Price of Play Settings Table on the following pages.

Set SW 3 on the VTS /Excel board as shown in the table above corresponding to the country required.

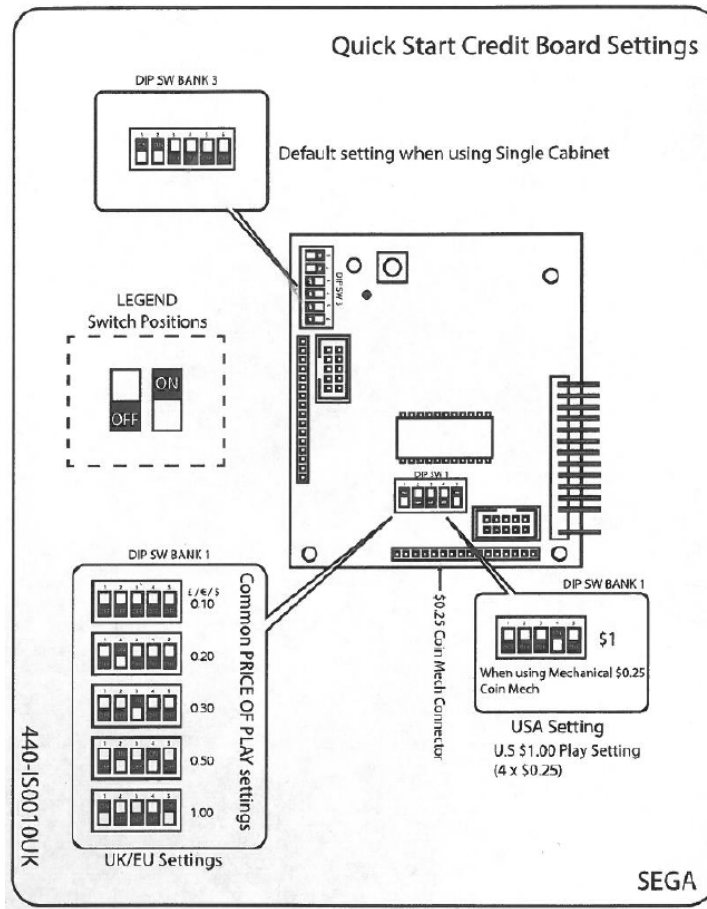
Please Note
The credit board automatically sets the validator for parallel and binary operation through an output on pin 8 of the 17 way pinstrip. For the feature to work it is necessary for the validator interconnecting cable to include at wire at this position

	PRICE OF PLAY	BONUS	DIL SWITCH 1				
			1	2	3	4	5
1	0.10	-	OFF	OFF	OFF	OFF	OFF
2	0.10	0.50 = 6 credits	ON	OFF	OFF	OFF	OFF
3	0.20	-	OFF	ON	OFF	OFF	OFF
4	0.20	0.50 = 3 credits	ON	ON	OFF	OFF	OFF
5	0.30	-	OFF	OFF	ON	OFF	OFF
6	0.30	1.00 = 4 credits	ON	OFF	ON	OFF	OFF
7	0.30	0.50 = 2 credits	OFF	ON	ON	OFF	OFF
8	0.30	1.00 = 3 credits	ON	ON	ON	OFF	OFF
9	0.40	-	OFF	OFF	OFF	ON	OFF
10	0.40	1.00 = 3 credits	ON	OFF	OFF	ON	OFF
11	0.50	-	OFF	ON	OFF	ON	OFF
12	0.50	1.00 = 3 credits	ON	ON	OFF	ON	OFF
13	0.50	2.00 = 5 credits	OFF	OFF	ON	ON	OFF
14	0.60	-	ON	OFF	ON	ON	OFF
15	0.60	1.00 = 2 credits	OFF	ON	ON	ON	OFF
16	0.80	-	ON	ON	ON	ON	OFF
17	0.80	1.50 = 2 credits	OFF	OFF	OFF	OFF	ON
18	1.00	-	ON	OFF	OFF	OFF	ON
19	1.00	2.00 = 3 credits	OFF	ON	OFF	OFF	ON
20	1.00	4.00 = 5 credits	ON	ON	OFF	OFF	ON
21	1.50	-	OFF	OFF	ON	OFF	ON
22	1.50	2.00 = 2 credits	ON	OFF	ON	OFF	ON
23	2.00	-	OFF	ON	ON	OFF	ON
24	2.00	5.00 = 3 credits	ON	ON	ON	OFF	ON
25	3.00	-	OFF	OFF	OFF	ON	ON
26	3.00	5.00 = 2 credits	ON	OFF	OFF	ON	ON
27	5.00	-	OFF	ON	OFF	ON	ON
28	5.00	10.00 = 3 credits	ON	ON	OFF	ON	ON
29	7.50	-	OFF	OFF	ON	ON	ON
30	7.55	10.00 = 2 credits	ON	OFF	ON	ON	ON
31	10.00	-	OFF	ON	ON	ON	ON
32		FREE PLAY	ON	ON	ON	ON	ON

The price of play is controlled by DIL switches 1 to 5 of a bank of 8, located on the EXCEL CREDIT BD.

Default values are in **BOLD**

12-5 PRICE OF PLAY QUICK START - USA



DIL SWITCH BANK ONE (5 way SW1)						
Item	Price	SW1	SW2	SW3	SW4	SW5
1	25cent	OFF	OFF	OFF	OFF	OFF
3	50cent	OFF	ON	OFF	OFF	OFF
5	75cent	OFF	OFF	ON	OFF	OFF
9	\$1.00	OFF	OFF	OFF	ON	OFF
16	\$2.00	ON	ON	ON	ON	OFF
DIL SWITCH BANK TWO (6 way SW3)						
Type	SW1	SW2	SW3	SW4	SW5	SW6
USA	OFF	OFF	OFF	OFF	OFF	OFF

13 LAMPS AND LIGHTING

⚠ WARNING

- When working with the product, be sure to turn the power off. Working with the power on may cause an electric shock or short circuit
- You may get burned by a hot fluorescent lamp or other lamps. Pay full attention to the lamps when performing the work
- Be sure to use lamps of the designated rating. Using lamps of undesignated rating can cause a fire or malfunctioning
- There is the danger of short circuits or smoke generation due to deterioration of insulation in lighting fixtures resulting from age deterioration. Check for anomalies such as the following: Does it smell like something is burning? Is there socket discoloration? Are any lamps being replaced frequently? Do lamps not go on properly?

⚠ CAUTION

The Coin Door Lamp utilises a 12v 1.2w Wedge Bulb. It is important that you replace this bulb or any other bulb of that of the same voltage and rating. Failing to observe this caution may result in PCB failure or possible fire hazard

13-1 COIN DOOR LAMP

Step 1. Open the Coin Door and locate the Lamp Housing directly behind the Coin Insert Bezel

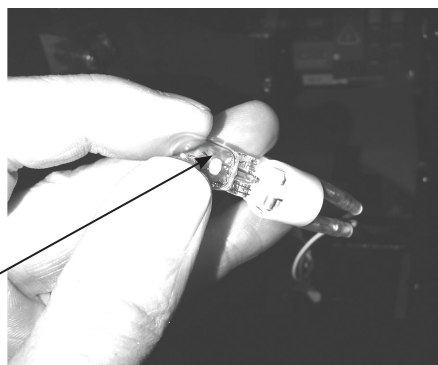
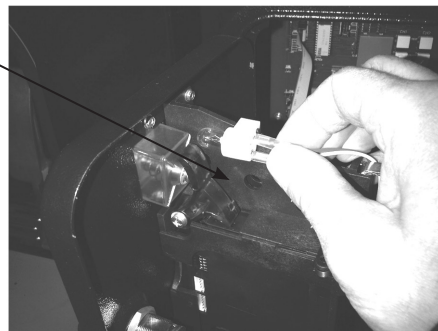
Step 2. Hold the Lamp Housing firmly between your index finger and thumb and gently pull upwards. Do not try to remove the Lamp Housing whilst holding the bulb as the bulb may break causing injury

Step 3. Once the Lamp Housing has been removed, carefully hold the bulb between your fingers and pull the Lamp Housing away

Do not twist either bulb or Lamp Housing while removing the bulb as this may cause damage to both bulb and/or Housing.

Step 4. Simply push-fit a replacement bulb of the same type and follow these steps in reverse to refit

Lamp Housing



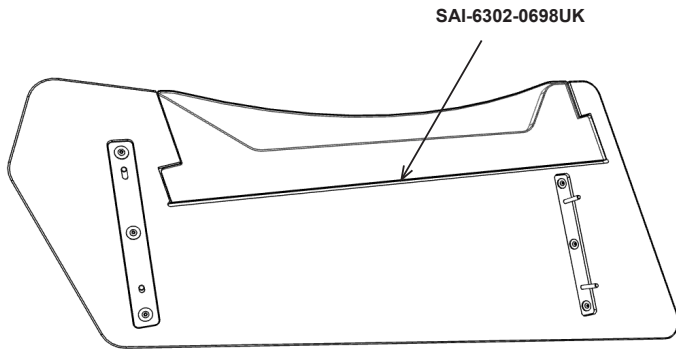
Type: Wedge Bulb - 12v, 1.2w

13-2 CABINET LED LIST

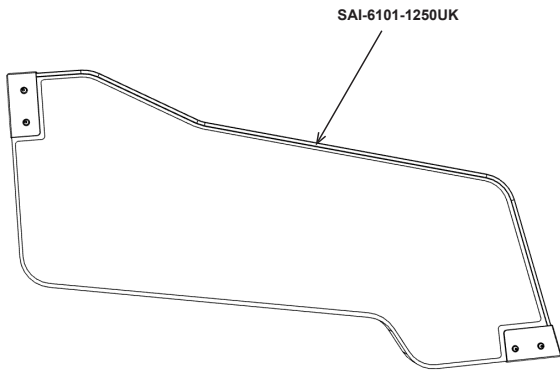
Related Assembly	Lighting Part # + Description	QTY
DR-1005UK/1010UK - ASSY CHEEK PANEL LH/ RH	SAI-6302-0698UK SERIAL LONG 698MM	1
DR-1020UK/1025UK - ASSY CHEEK PANEL LOWER LH/RH	SAI-6101-1250UK RGB LONG 1250mm	1
DR-1050UK - ASSY DOWNLIGHTER	SAI-6101-0950UK RGB LONG 950mm	1
DR-3005UK - ASSY PEDESTAL UPPER	SAI-6302-1594UK SERIAL LONG 1594MM	1
DR-3015UK - ASSY PEDESTAL LOWER	SAI-6302-1594UK SERIAL LONG 1594MM	1
DR-3055UK - ASSY SEAT REAR LED	838-0055UK PCBA LED QUADRANT	4
DR-3070UK - ASSY JOYSTICK	SAI-6101-0800UK RGB LONG 800MM	1
DR-5000UK - ASSY BILLBOARD	SAI-6603-825UK LED LONG RIGID WHITE 825MM	4
	SAI-6307-1196UK NEON SERIAL LONG 1196mm	1

13-3 CABINET LED DIAGRAMS

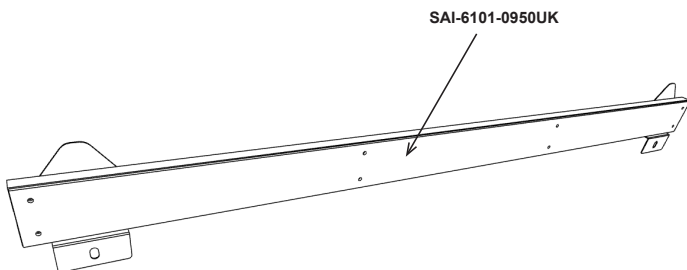
Cheek Panel LH/RH



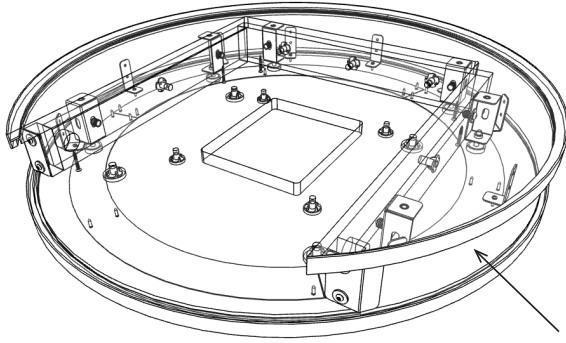
Cheek Panel Lower LH/RH



Downlighter

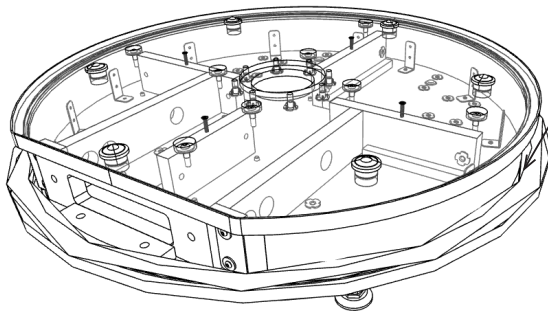


Pedestal Upper



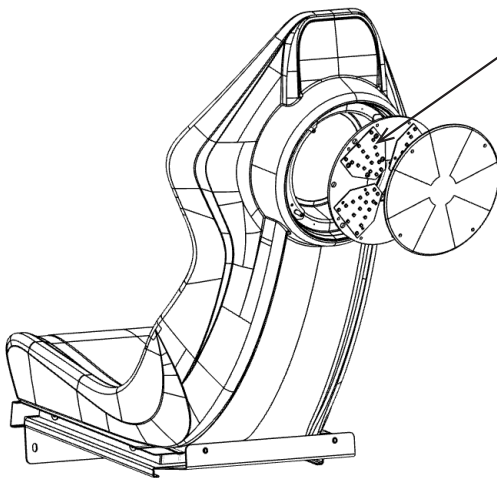
SAI-6302-1594UK

Pedestal Lower



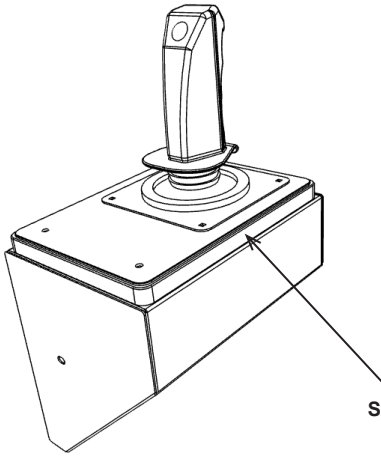
SAI-6302-1594UK

Seat Rear LED



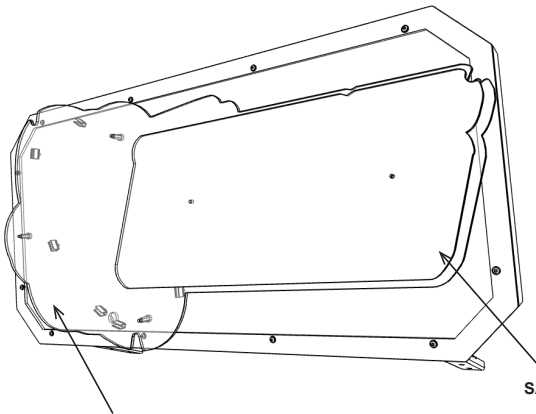
838-0055UK

Joystick



SAI-6101-0800UK

Billboard



SAI-6307-1196UK

SAI-6603-825UK

14 PERIODIC INSPECTION

The items listed below require periodic check and maintenance to retain the performance of this machine and to ensure safe business operation.

When handling the controller, the player will be in direct contact with it. In order to always allow the player to enjoy the game, be sure to clean it regularly.

WARNING

- Every 6 months check to see if power cords are damaged, the plug is securely inserted, no dust has accumulated between the socket outlet and the power plug, etc. Using the product with accumulated dust in the interior may cause fire or electric shock
- Never use a water jet, etc. to clean the inside or outside of the Cabinet. If wetness occurs for any reason, do not use the product until it has completely dried
- Once a year, request the office shown on this Manual or the dealer from whom the product was originally purchased to perform the internal cleaning. Using the product with accumulated dust in the interior may cause fire or other accidents
- Note that you are liable for the cost of cleaning the interior parts
- There is the danger of accidents involving electrical shorts circuits or fire caused by factors such as the deterioration of insulation in electrical and electronic equipment over time. Check that there are no abnormalities such as odours from burning

TABLE 01 PERIODIC INSPECTION TABLE

PERIOD	ITEM	DESCRIPTION	REFERENCE
As appropriate	Cabinet Surface	Cleaning	As Below
	Control Unit Surface		
Daily	Cabinet	Confirm Adjusters Contact Floor	Section 6-3
	LCD	Screen Cleaning	Section 10
		Screen Alignment	Section 9-9
Monthly	Cabinet	Speaker Volume	Section 9-8
	Controller Units	Check Each Input Device	Section 9-4
		Check Each Output Device	Section 9-5
	LEDs	LED Inspection	Section 13
	Coin Selector	Coin Path Inspection	Section 12-1
Coin Insertion Test		Section 12-1	
Every 3 Months	Coin Selector	Cleaning	Section 12-1
1 Year	Game BD	Cleaning	Section 16
	Power Cables	Inspection / Cleaning	Section 6-3
	Cabinet Interior	Cleaning	Section 14

Cleaning the Cabinet Surfaces

When the Cabinet surfaces are badly soiled, remove stains with a soft cloth dipped in water or diluted (with water) chemical detergent and squeezed dry. To avoid damaging surface finish, do not use solvents such as thinner, benzene, etc. other than ethyl alcohol, or abrasives, bleaching agent and chemical dustcloth.

Some general-purpose household, kitchen and furniture cleaning products may contain strong solvents that degrade plastic components, coatings, and print. Before using any cleaning product, read the product's cautionary notes carefully and test the product first on a small area that is not highly visible.

DISPLAY (LCD SCREEN Cleaning)

When the Display LCD Screen surfaces are dirty, smudges or greasy, gently wipe the display with a dry, lint-free, soft cloth. If you see a scratch-like mark on your display, it might be a stain which has been transferred from food like matter when the screen was depressed from the outside. To avoid damaging surface finish, do not use such solvents as thinner, benzene, etc. the same applies to ethyl alcohol, or abrasives, bleaching agent and chemical dustcloths.

Wipe or dust the stain gently with a dry, soft cloth. If the stain remains, moisten a lint-free, soft cloth with water or a 50-50 mixture of isopropyl alcohol and water that does not contain impurities. Wring out as much of the liquid as possible and wipe the display again; do not let any liquid drip from the cloth.

Antistatic and purpose made LCD cleaning wipes are also acceptable alternatives.

15 TROUBLESHOOTING

15-1 TROUBLESHOOTING (WHEN NO ERROR MESSAGE IS SHOWN)

WARNING

- This work should be performed by site maintenance personnel or other skilled professionals. Work performed by non-technical personnel can cause a severe accident such as an electric shock. If there are no site maintenance personnel or other skilled professionals available, turn off the power immediately and contact the office given in this Manual or from point of purchase
- When working with the product, be sure to turn the power off. Working with the power on may cause and electric shock or short circuit accident
- In order to prevent electric shock and short circuit, be sure to turn power off before performing work
- Be careful so as not to damage wirings. Damaged wiring can cause electric shock or short circuit
- After removing the cause of the functioning of the Circuit Protector, reinstate the Circuit Protector. Depending on the cause of the functioning, using the Circuit Protector as is without removing the cause can cause generation of heat and fire hazard
- In the event that a problem cannot be resolved by employing the procedures listed in this Manual, be sure to request service from the office shown in this Manual or the dealer from whom the product was originally purchased. Attempts to employ procedures other than those specified in this Manual can cause electrical shock, shorting, or fire
- In the event of a problem that is not described here, be sure to contact the office shown on this Manual or the dealer from whom the product was originally purchased. Careless attempts at repair can result in electrical shock, shorting, or fire

STOP IMPORTANT

- If an error message is displayed, identify the cause and without delay take the appropriate countermeasures. Leaving the error unaddresses could result in a breakdown
- If a problem occurs, first inspect the connection of any wiring connectors
- Static electricity from your body may damage some electronic devices on the IC board. Before handling any IC board, touch a grounded metallic surface so that static electricity is discharged

If a problem occurs, first check to make sure that the wiring connectors are properly connected.

TABLE 01

PROBLEM	CAUSE	COUNTERMEASURE
With main switch ON there is no activation	Power is not supplied	Insert power lead all the way into outlet
	Supply voltage is not correct	Adjust supply voltage to correct value
There is sound and lighting but no video signal	Video signal connector or monitor power connector is not properly connected	Check Monitor connections and cables
No sound	Volume not properly adjusted	Adjust volume
	Poor connection of connectors	Check connections of amp
	Board, amp or speaker fault	Run speaker test to check
Incorrect colour on monitor	Poor connection of video cable	Confirm connection of video/DVI cable
	Monitor fault	Contact point of purchase
Screen saturation and brightness not correct	Screen not properly adjusted	Adjust screen settings
Switch and volume pot input does not work	Poor connection of connectors	Check connection to I/O BD
		Check the connection to Game BD
Start button input does not work	Switch fault	Replace switch
Start button does not light	Lamp failure	Replace lamp
Stays on SEGA logo and does not go to advertise screen (error)	Poor condition of cabinet	Refer to list of errors
	CPU error	Contact point of purchase
Controller Units do not work properly	Improper controller calibration	Configure using TEST mode
	Poor harness connection	Check Controller harnessing

Note:

The table above shows a list of possible failures and a brief solutions. If problems persist further or there are additional issues which may not be listed here. Please contact you point of sale or the SEGA Service Department on the contact numbers shown at the end of this Manual.

16 GAME BOARD

WARNING

- When working with the product, be sure to turn the power off. Working with the power on may cause an electric shock or short circuit
- Be careful not to damage the wires. Damaged wires may cause electric shock, short circuit or present a fire risk
- Do not expose the Game Board, etc. without good reason. Failure to observe this can cause electric shock hazard or malfunctioning
- Do not use this product with connectors other than those that were connected and used with the Game Board at the time of shipping. Do not carelessly connect wires to connectors that were not used at the time of shipping as this may cause overheating, smoke, or fire damage
- When returning the Game Board after making repairs or replacements, make sure that there are no errors in the connection of connectors. Erroneous connections can lead to electrical shock, short circuits or fires
- When connecting a connector, check the direction carefully. Connectors must be connected in only one direction. If indiscriminate loads are applied in making connections, the connector or its terminal fixtures could be damaged, resulting in electrical shock, short circuits, or fires

CAUTION

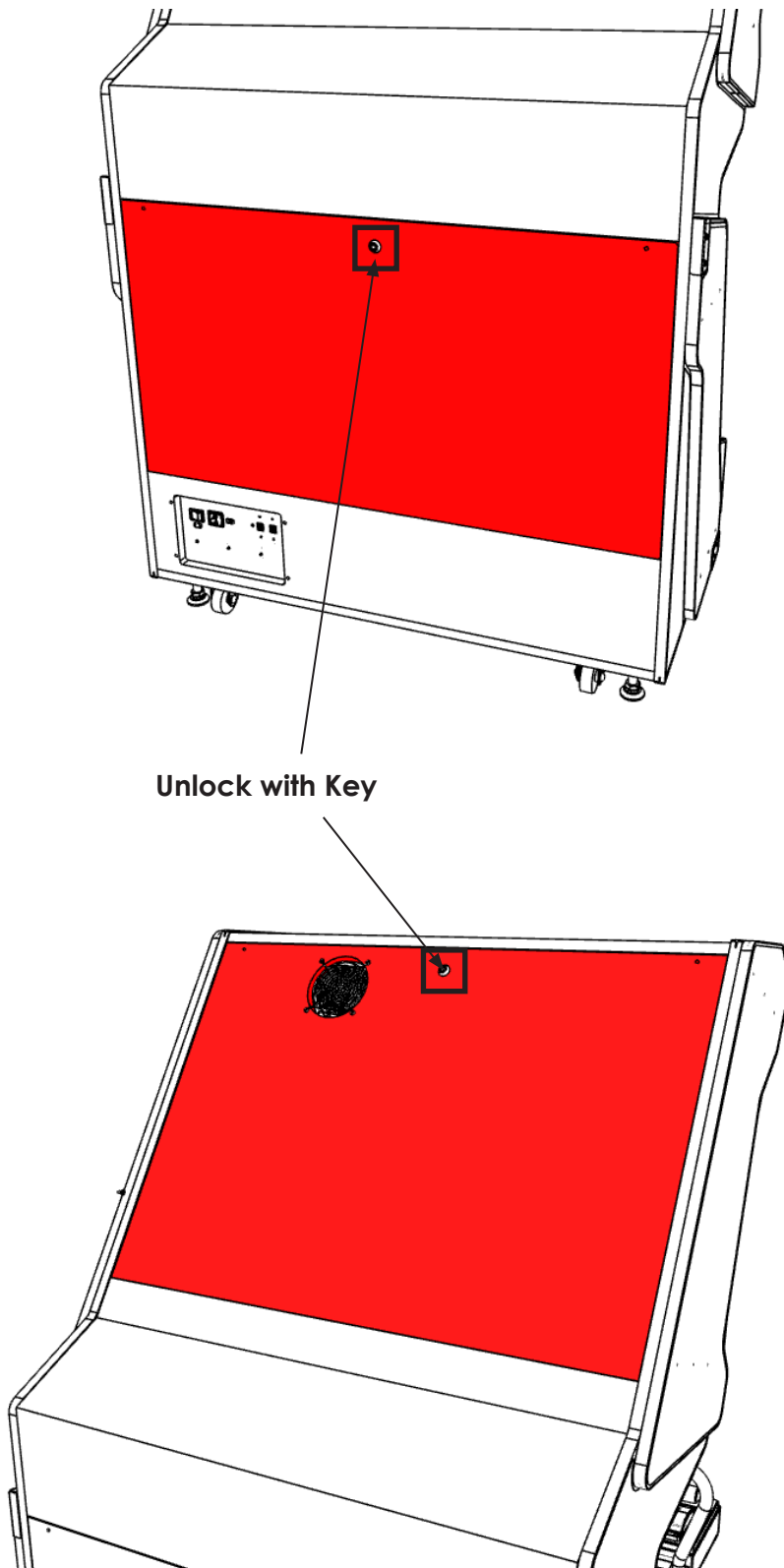
- In this product, setting changes are made during the Test Mode. The Game Board need not be operated. Use the Game Board, etc. as is with the same setting made at the time of shipment so as not to cause electric shock and malfunctioning
- Static electricity from your body may damage some electronics devices on the IC board. Before handling the IC board, touch a grounded metallic surface so that the static electricity can be discharged

STOP IMPORTANT

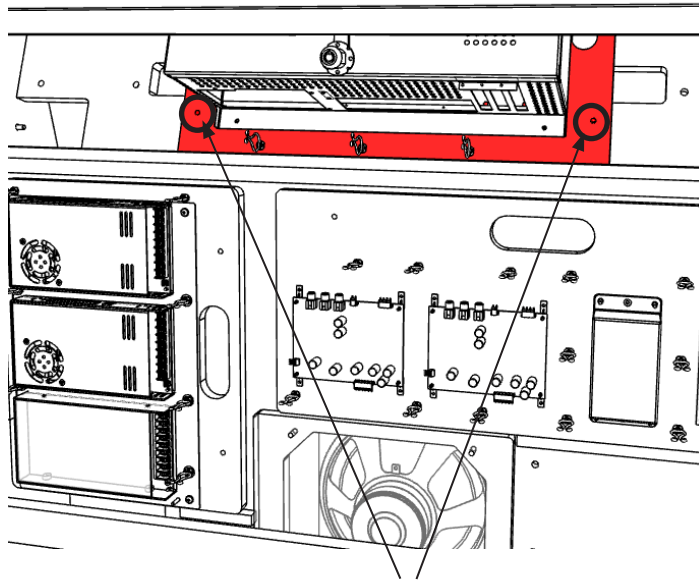
- When a Game Board is to be replaced, put the old Game Board with anomaly into a special box for replacing the Game Board. If a special box is not available or if it has been damaged, arrange to have the Game Board packed in suitable packaging
- For replacement or repair, pack the Game Board and send it without disassembling it. Order for servicing may not be accepted if any part of the Game Board has been removed. If any part is removed, a service fee will be charged even if the warranty period has not yet expired
- Do not remove the Key Chip from the Game Board before sending the board for servicing

16-1 HOW TO REMOVE GAME BOARD

- 1 Turn off the power.
- 2 Locate Door Upper Back and Door Lower Back. Unlock using Master Key and remove each Door

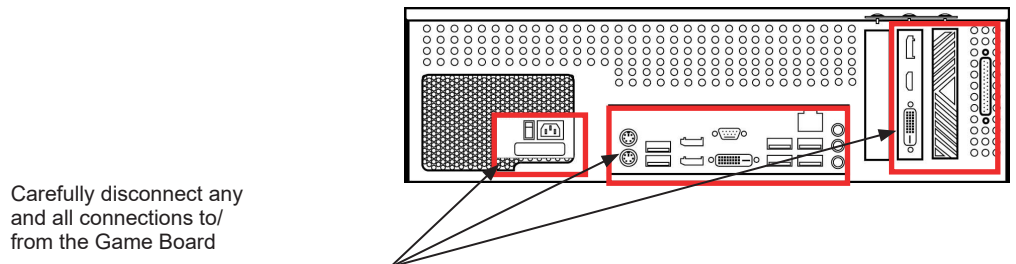


3 The Game Board is located here. Remove the (2) M4 fixings shown



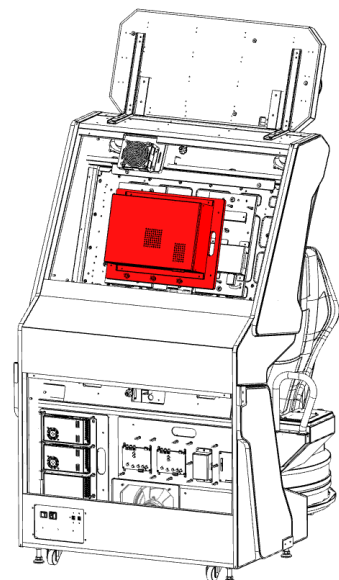
Remove fixings

4 Disconnect all of the connectors connected to the Game Board



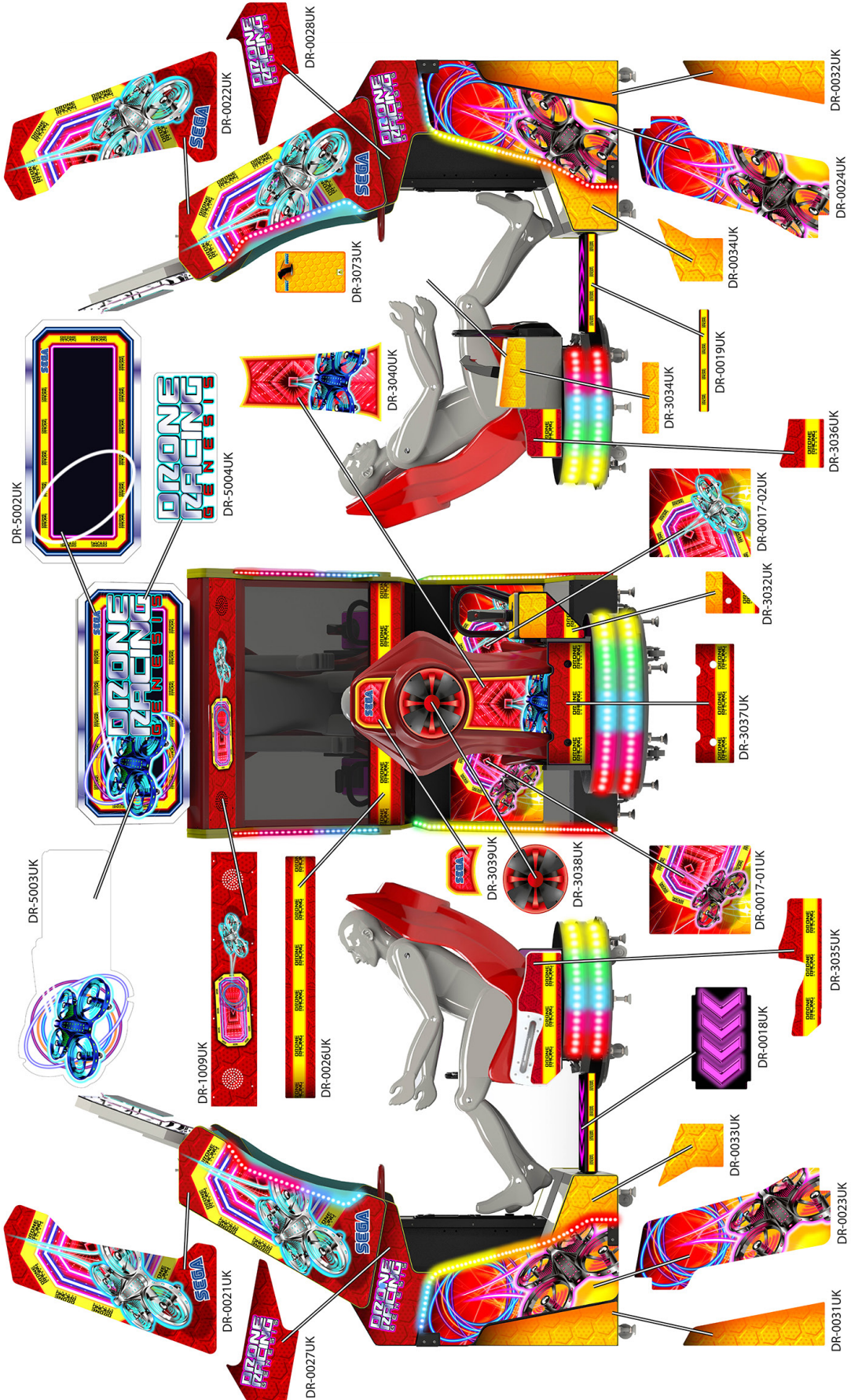
Carefully disconnect any and all connections to/ from the Game Board

5 Lift and remove the Game Board from the Cabinet. **The Game Board is HEAVY** so take care not to clash with other components when removing as this could cause component damage



17 DESIGN RELATED PARTS

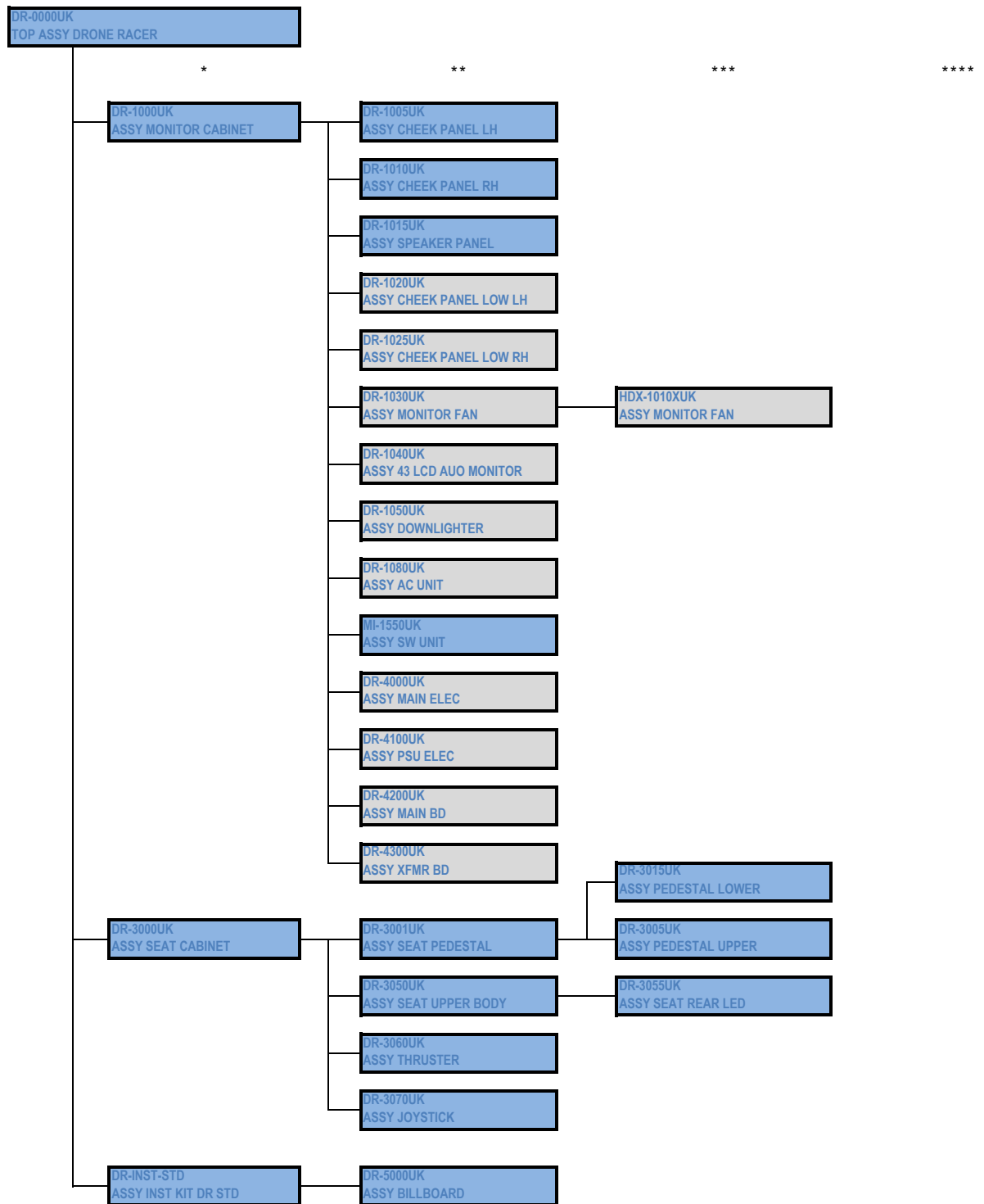
For the warning display stickers, refer to Section 1.



17 DESIGN RELATED PARTS

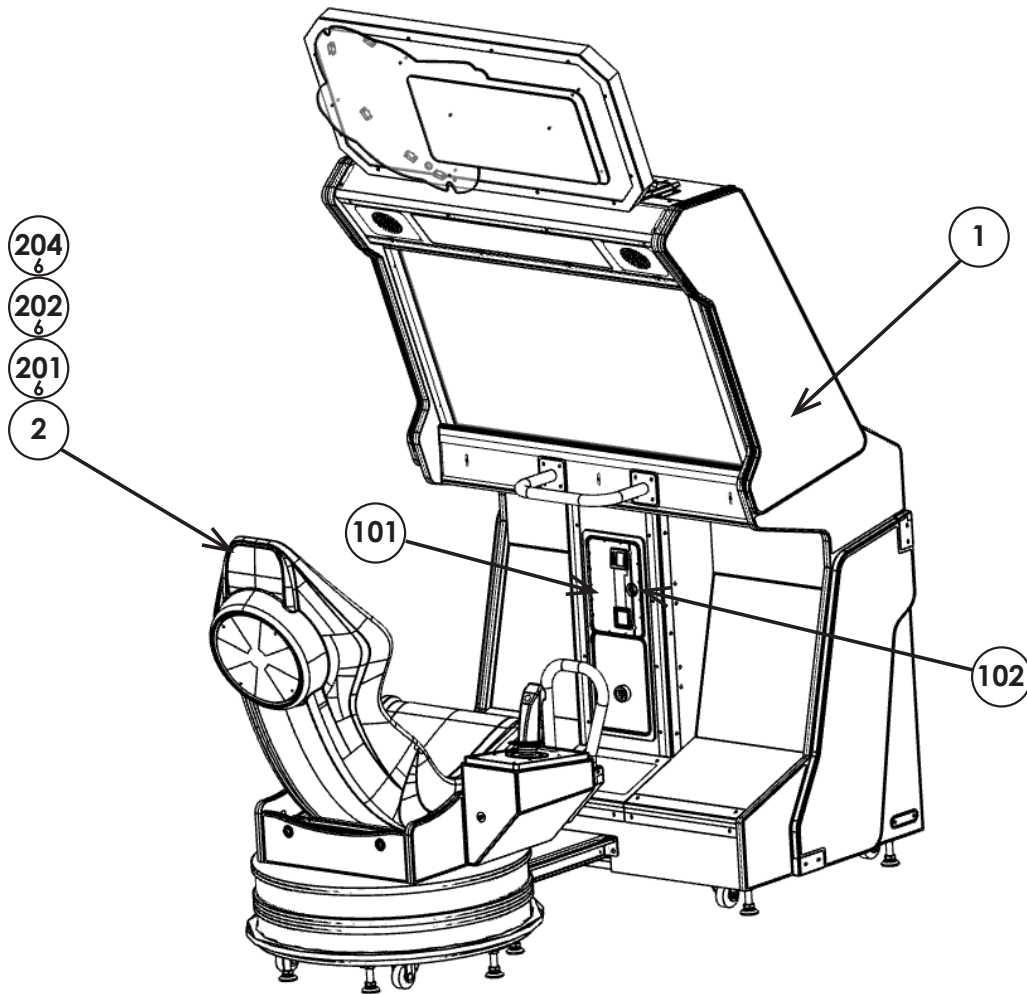
18 PARTS LIST

DRONE RACING GENESIS STRUCTURE FLOW



Please note: The location of all artwork can be found in Chapter 17 of this manual.

1 TOP ASSY DRONE RACING (DR-0000UK)



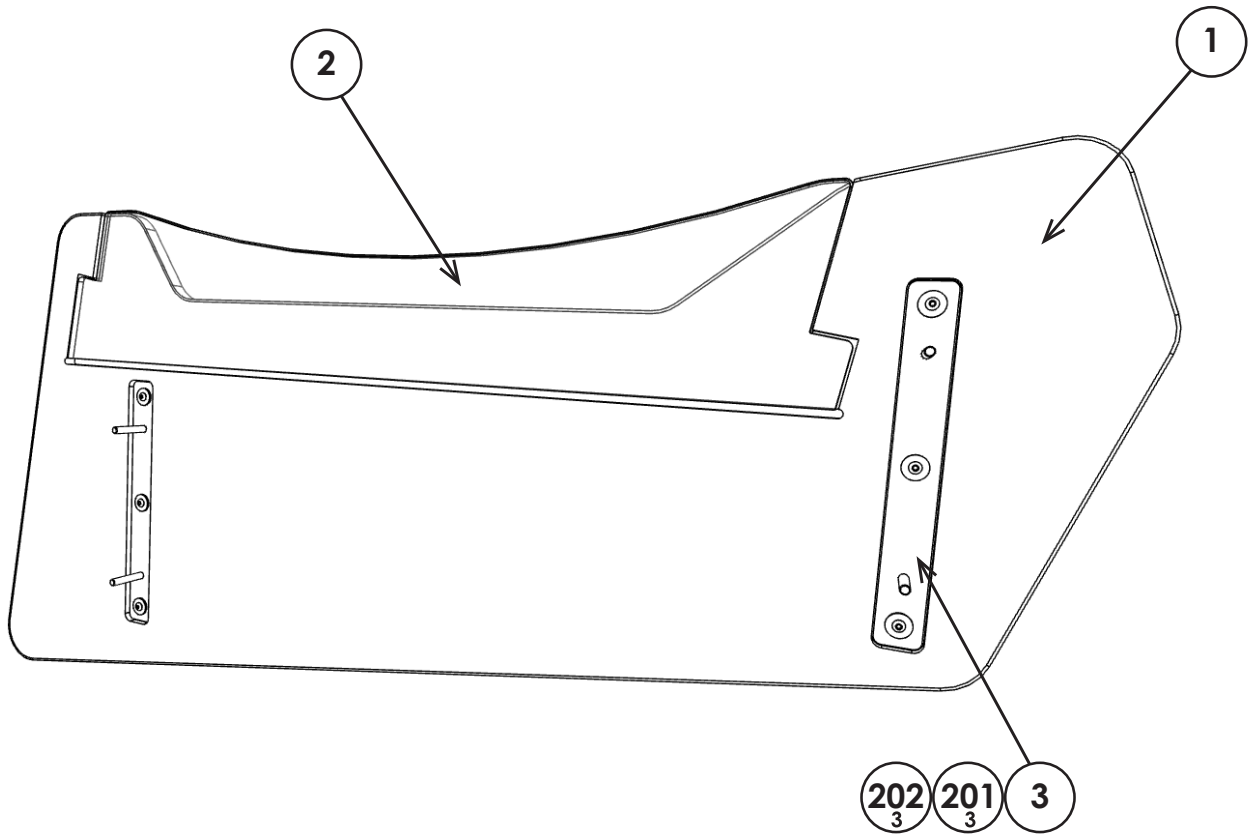
ITEM NO	PART NO	DESCRIPTION	QTY
*1	DR-1000UK	ASSY MONITOR CABINET	1
*2	DR-3000UK	ASSY SEAT CABINET	1
*3	440-PL2000UK	LABEL SUITE DRONE RACING	1
*4	421-7988-91UK	STICKER SERIAL NUMBER UK	1
*101	220-5736-01	DFMD W/UNIV CRADLE&CASHBOX ENC HI SEC	1
*102	220-5575UK	LOCK (J9117) KEY TO LIKE 22MM W CAM	1
*201	029-B00425	M4X25 SKT BH PAS	30
*202	029-B00625	M6X25 SKT BH PAS	22
*203	060-S00600	M6 WSHR SPR PAS	4
*204	068-441616	M4 WSHR 16OD FLT PAS	30
*205	068-652016	M6 WSHR 20OD FLT PAS	16
*401	DR-INST-STD	ASSY INST KIT DR STD	1
*402	SAECE-xxx	DECLARATION OF CONFORMITY	1
*403	PK0468	SHRINK WRAP RD STD	2
*404	PK0547	PALLET DR MONITOR CABI	1
*405	PK0548	PALLET DR SEAT CABI	1
*406	420-0039UK	MANUAL DRONE RACING	1

Please note: The location of all labels can be found in Chapter 1 of this manual.

2 ASSY MONITOR CAB (DR-1000UK)**(D-2/2)**

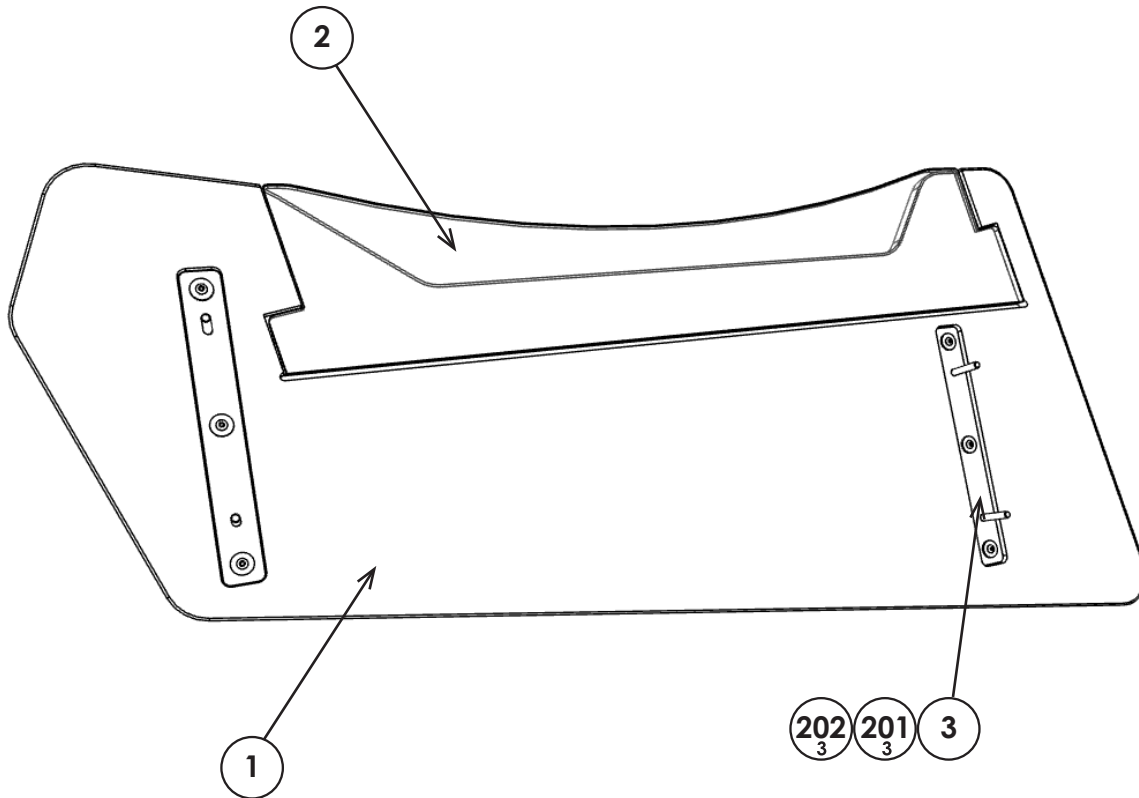
ITEM NO	PART NO	DESCRIPTION	QTY
**1	DR-1005UK	ASSY CHEEK PANEL RH	1
**2	DR-1010UK	ASSY CHEEK PANEL LH	1
**3	DR-1015UK	ASSY SPEAKER PANEL	1
**4	DR-1020UK	ASSY CHEEK PANEL LOWER LH	1
**5	DR-1025UK	ASSY CHEEK PANEL LOWER RH	1
**6	DR-1030UK	ASSY MONITOR FAN	1
**7	DA-7280UK	ASSY 43" LCD AUO 01 MONITOR	1
**8	DR-1080UK	ASSY AC UNIT	1
**9	MI-1550UK	ASSY SWITCH UNIT	1
**10	DR-4000UK	ASSY MAIN ELEC	1
**11	DR-4100UK	ASSY PSU ELEC	1
**12	DR-4200UK	ASSY MAIN BD	1
**13	DR-4300UK	ASSY XFMR BD	1
**14	DR-1050UK	ASSY DOWNLIGHTER	1
**17	DR-0002UK	BRKT JOINT PNL MOUNT	1
**18	DR-0011UK	BRKT MTG SW UNIT	2
**19	DR-0016UK	BRKT FOOTREST	2
**20	DR-1002UK	ASSY FRONT CABINET	1
**21	DR-1003UK	PANEL GLASS RETAIN LOWER	1
**22	DR-1013UK	BRKT GLASS RETAIN SIDE	2
**23	DR-1014UK	PLATE JOINT BRIDGE ACCESS	1
**24	DR-1017UK	TRIM VERTICAL LH	1
**25	DR-1018UK	TRIM VERTICAL RH	1
**26	DA-7279UK	GLASS LCD 43 AUO SCREEN PROTECT	1
**27	DV-1006UK	BRKT FRONT BRIDGE JOINT	1
**28	DR-1019UK	HANDRAIL	1
**29	RR-8505XUK	BRKT BILLBOARD RETAINING	2
**101	130-04030-E	SPKR ELIP 40HM 30W VIS DX4x6P	2
**102	130-08090-W	WOOFER 80HM 90W W250-8	1
**103	280-A012640-WX	ROUTER TWIST D12 SO6.4 WOOD XL	30
**104	SAI-6603-0500UK	LED SINGLE COLOUR SHORT	2
**201	029-B00412-OB	M4X12 SKT BH BLK	37
**202	029-B00425-OB	M4X25 SKT BH BLK	36
**203	029-B00440	M4X40 SKT BH PAS	6
**204	029-B00612	M6X12 SKT BH PAS	2
**205	029-B00625	M6X25 SKT BH PAS	2
**206	029-B00825	M8X25 SKT BH PAS	4
**207	050-F00400	M4 NUT FLG SER PAS	4
**208	050-F00600	M6 NUT FLG SER PAS	16
**209	060-F00400	M4 WSHR FORM A FLT PAS	16
**210	060-S00400	M4 WSHR SPR PAS	12
**211	068-441616-OB	M4 WSHR 16OD FLT BLK	66
**212	068-652016	M6 WSHR 20OD FLT PAS	20
**213	068-852216	M8 WSHR 22OD FLT PAS	4
**214	012-P03512-F	N6X1/2" S/TAP FLG PAS	8
**215	029-B00640-OB	M6X40 SKT BH BLK	8
**301	DR-60004UK	WH COIN TOWER	1
**302	DR-60005UK	WH MONITOR CAB LIGHTING & AUDIO	1
**303	DR-60007UK	WH MONITOR CABINET LINK	1
**304	MB-60031UK	WH MONITOR PWR	1
**305	MI-60017UK	WH SPEAKER A	2

3 ASSY CHEEK PANEL LH (DR-1005UK)



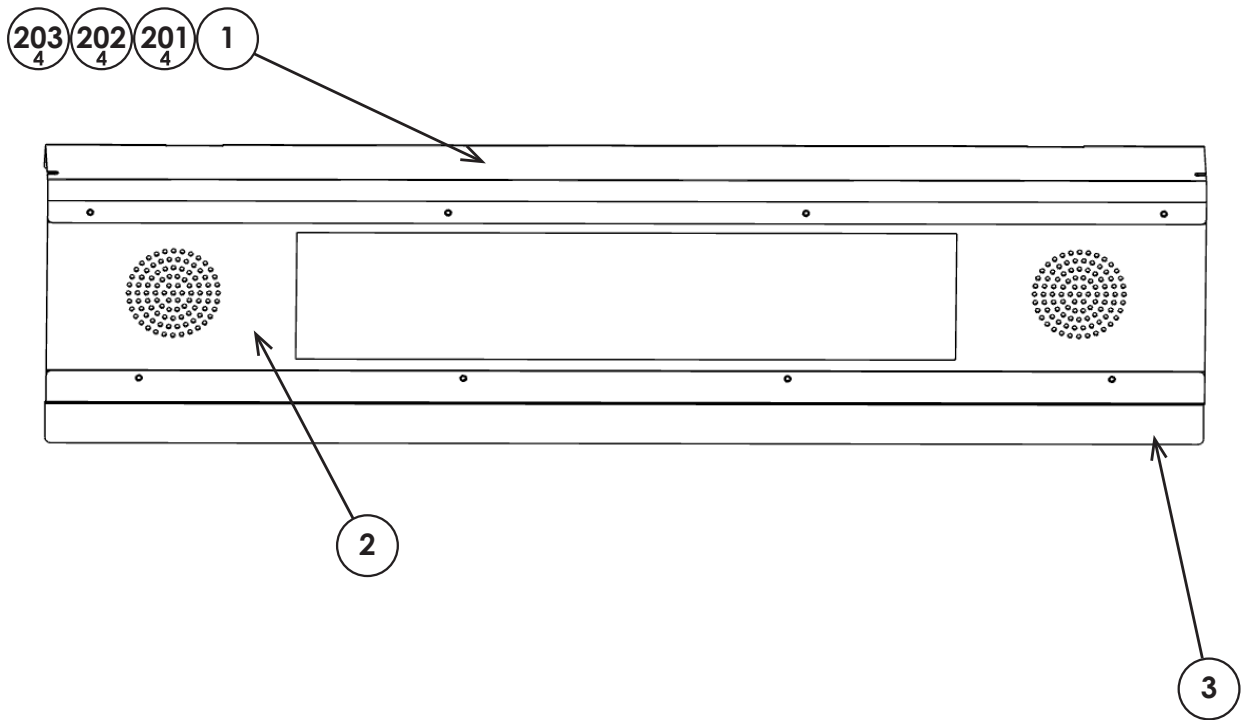
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-1006UK	PANEL LH CHEEK	1
***2	DR-1007UK	PANEL CHEEK ACRYLIC	1
***3	DR-1008UK	PLATE STUD	2
***101	SAI-6302-0698UK	SERIAL LONG 698MM	1
***201	029-B00412	M4X12 SKT BH PAS	6
***202	068-441616	M4 WSHR 16OD FLT PAS	6

④ ASSY CHEEK PANEL RH (DR-1010UK)



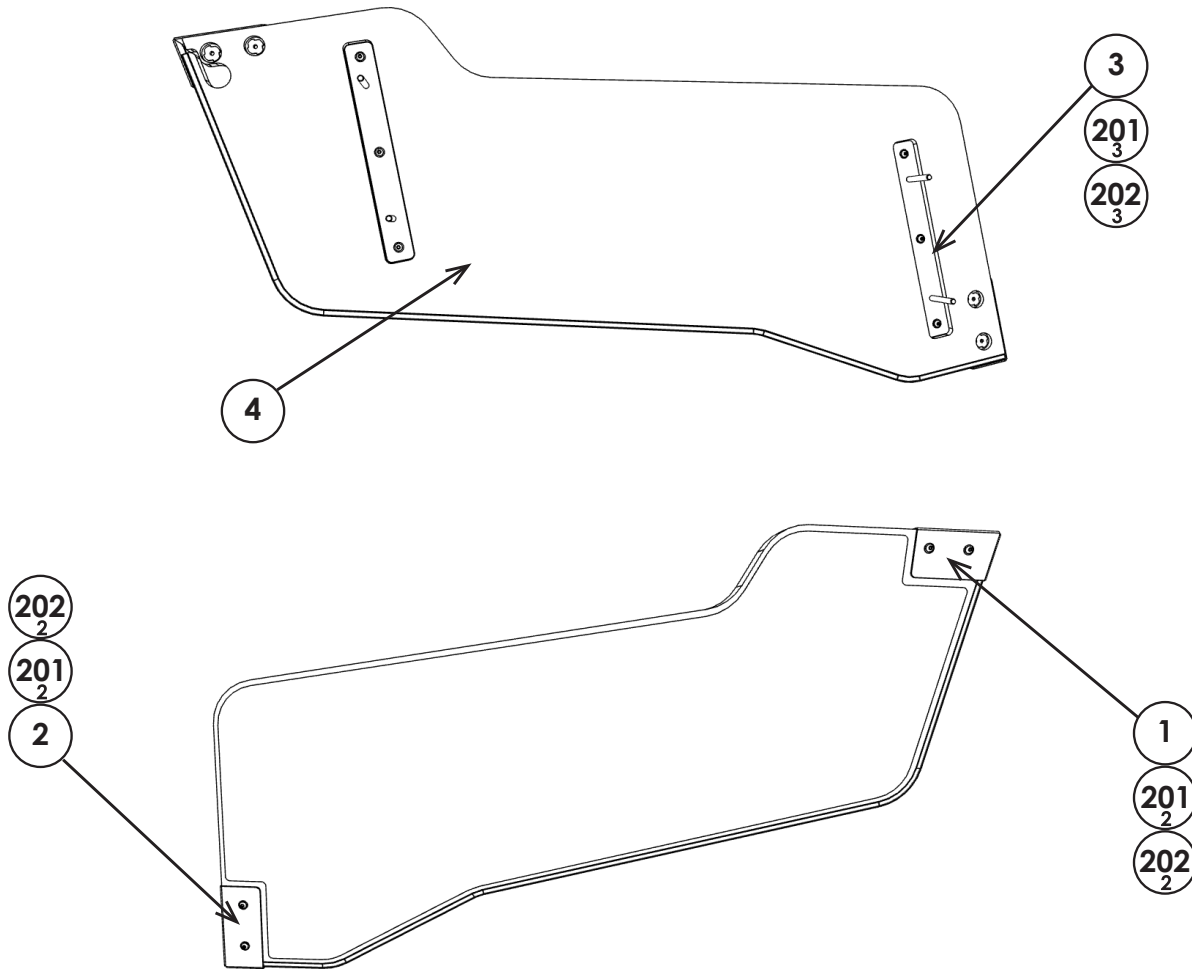
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-1011UK	PANEL RH CHEEK	1
***2	DR-1007UK	PANEL CHEEK ACRYLIC	1
***3	DR-1008UK	PLATE STUD	2
***101	SAI-6302-0698UK	SERIAL LONG 698MM	1
***201	029-B00412	M4X12 SKT BH PAS	6
***202	068-441616	M4 WSHR 16OD FLT PAS	6

5 ASSY SPEAKER PANEL (DR-1015UK)



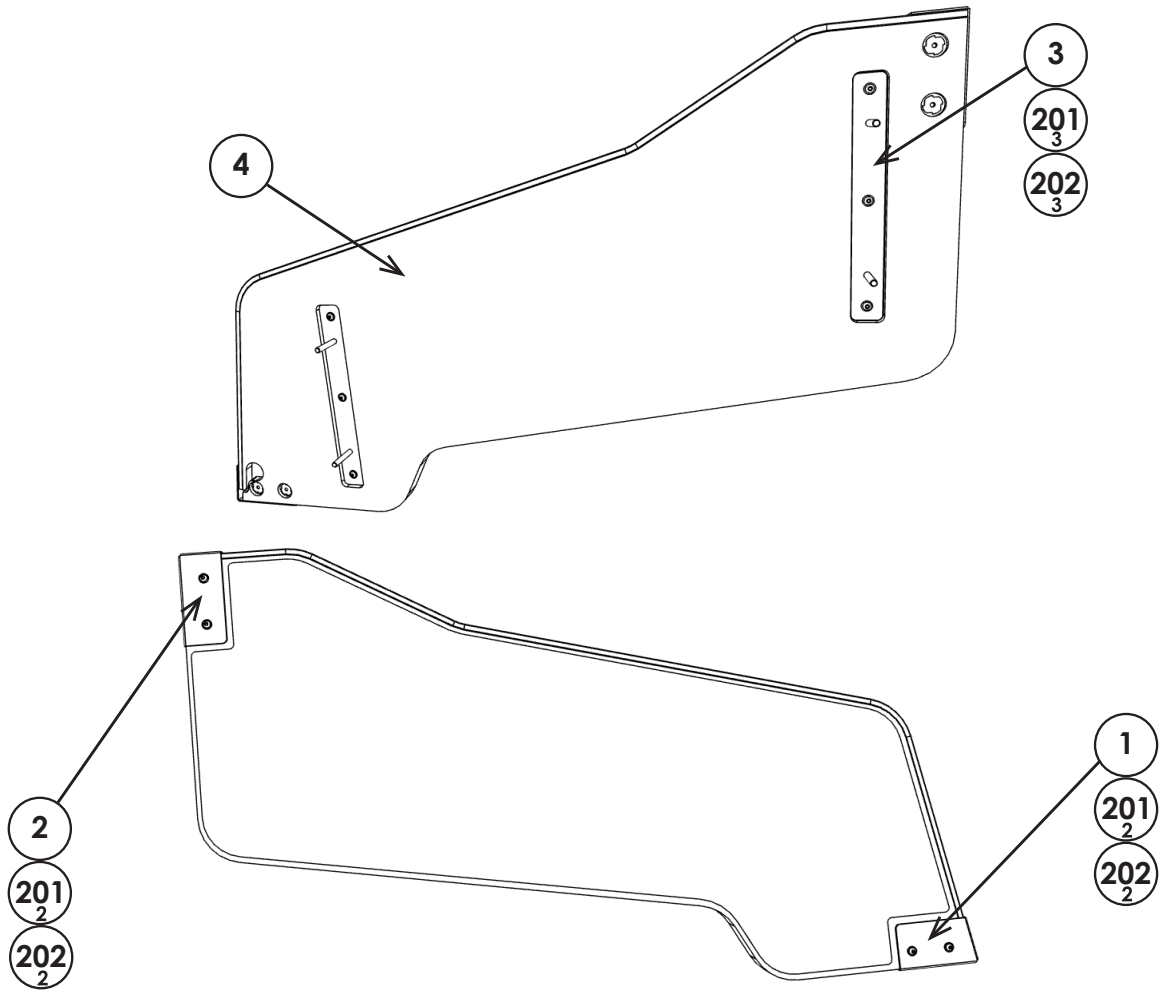
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-1004UK	MOUNT SPEAKER PANEL	1
***2	DR-1009UK	SPEAKER PANEL	1
***3	DR-1012UK	BRKT GLASS RETAIN UPPER	1
***201	050-F00400	M4 NUT FLG SER PAS	8
***202	068-441616	M4 WSHR 16OD FLT PAS	8

6 ASSY CHEEK PANEL LOWER LH (DR-1020UK)



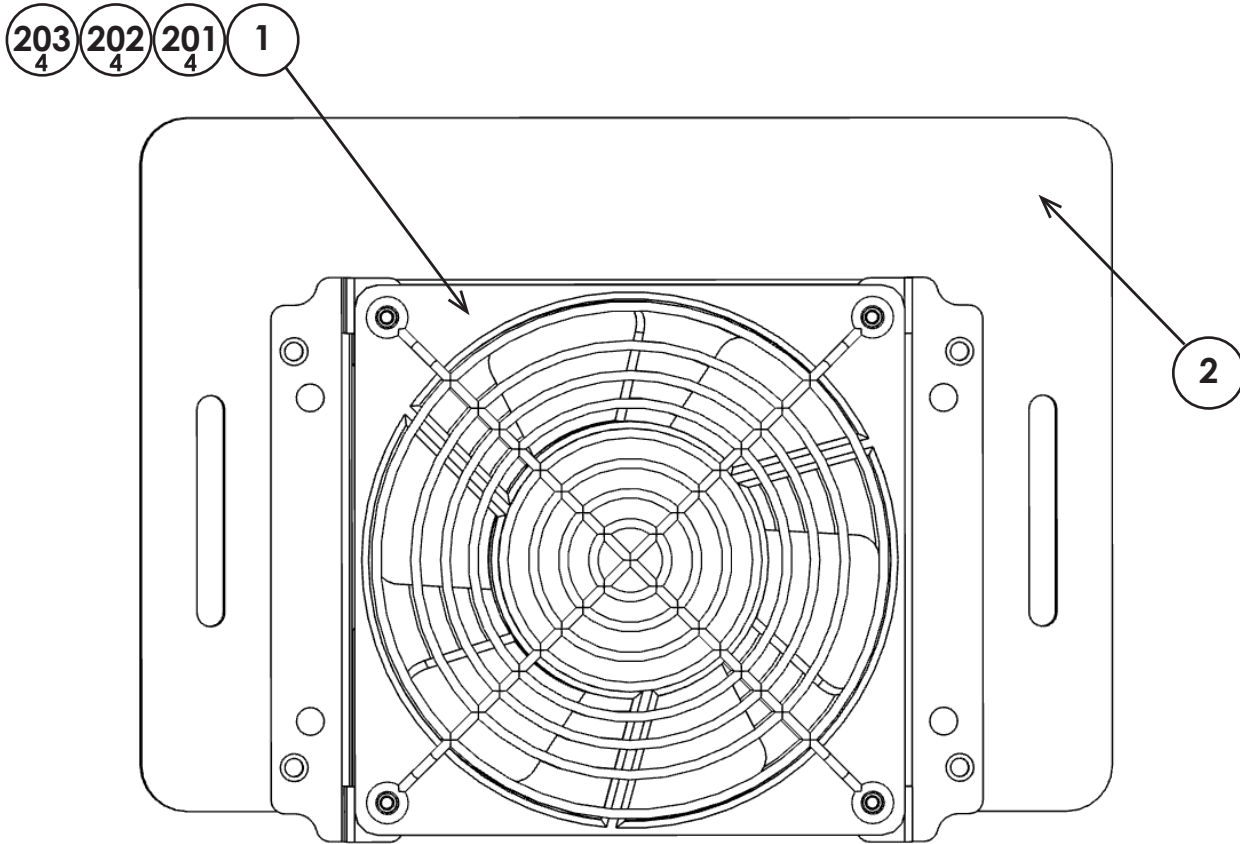
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-0003UK	BRKT ENDCAP LED EDGING UPPER L	1
***2	DR-0007UK	BRKT ENDCAP LED EDGING LOWER L	1
***3	DR-1008UK	PLATE STUD	2
***4	DR-1021UK	PANEL LH CHEEK LOWER	1
***101	SAI-6101-1250UK	RGB LONG 1250mm	1
***201	029-B00412-OB	M4X12 SKT BH BLK	10
***202	068-441616-OB	M4 WSHR 16OD FLT BLK	10

7 ASSY CHEEK PANEL LOWER RH (DR-1025UK)



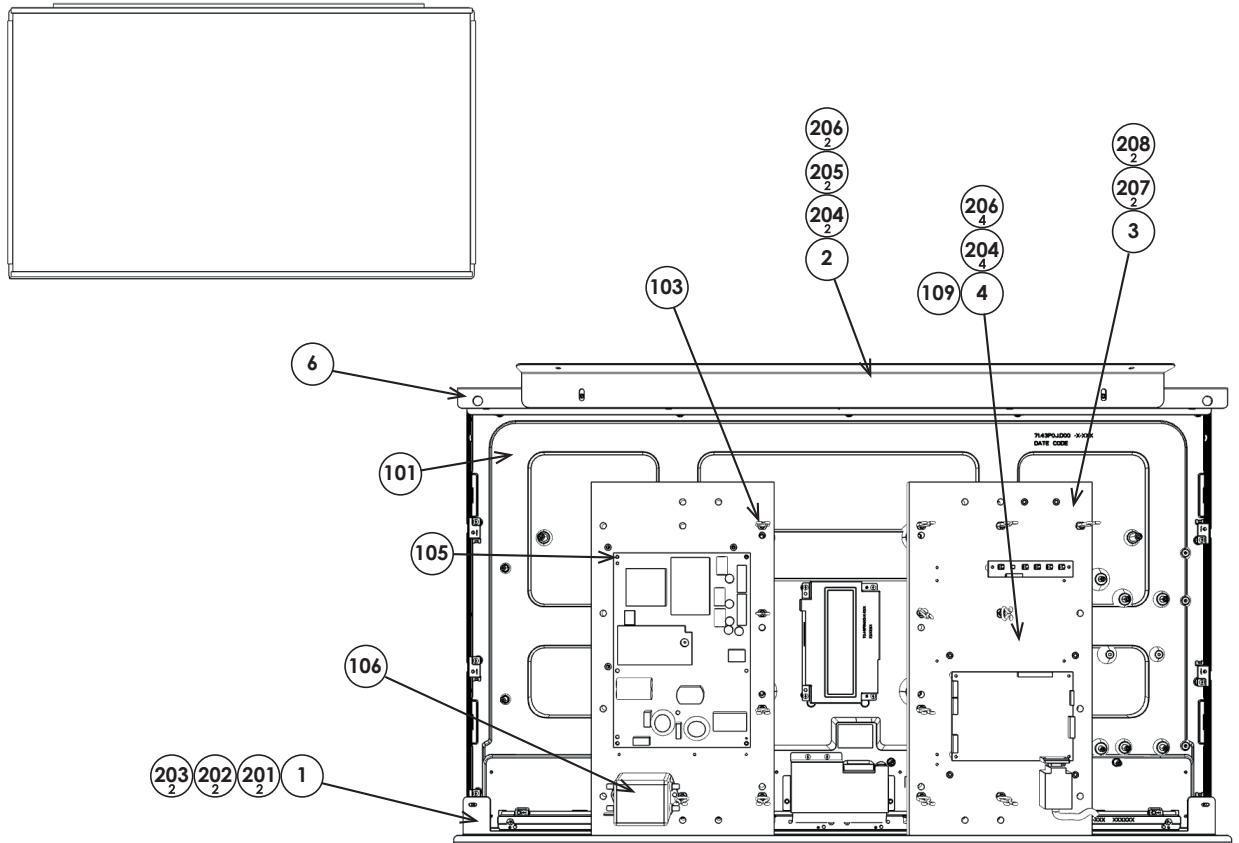
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-0004UK	BRKT ENDCAP LED EDGING UPPER R	1
***2	DR-0008UK	BRKT ENDCAP LED EDGING LOWER R	1
***3	DR-1008UK	PLATE STUD	2
***4	DR-1026UK	PANEL RH CHEEK LOWER	1
***101	SAI-6101-1250UK	RGB LONG 1250mm	1
***201	029-B00412-OB	M4X12 SKT BH BLK	10
***202	068-441616-OB	M4 WSHR 16OD FLT BLK	10

8 ASSY MONITOR FAN (DR-1030UK)



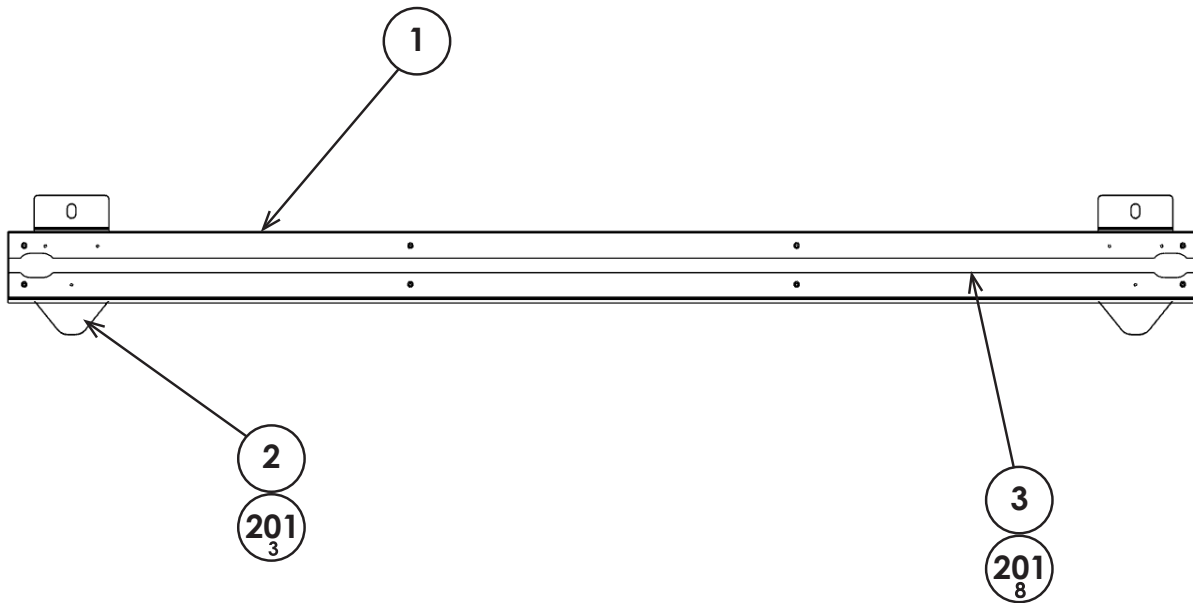
ITEM NO	PART NO	DESCRIPTION	QTY
***1	HDZ-1010XUK	ASSY MONITOR FAN	1
***2	DR-1031UK	PANEL FAN	1
***201	029-B00412	M4X12 SKT BH PAS	4
***202	060-F00400	M4 WSHR FORM A FLT PAS	4
***203	060-S00400	M4 WSHR SPR PAS	4

9 ASSY 43 LCD AUO 01 MONITOR (DA-7280UK)



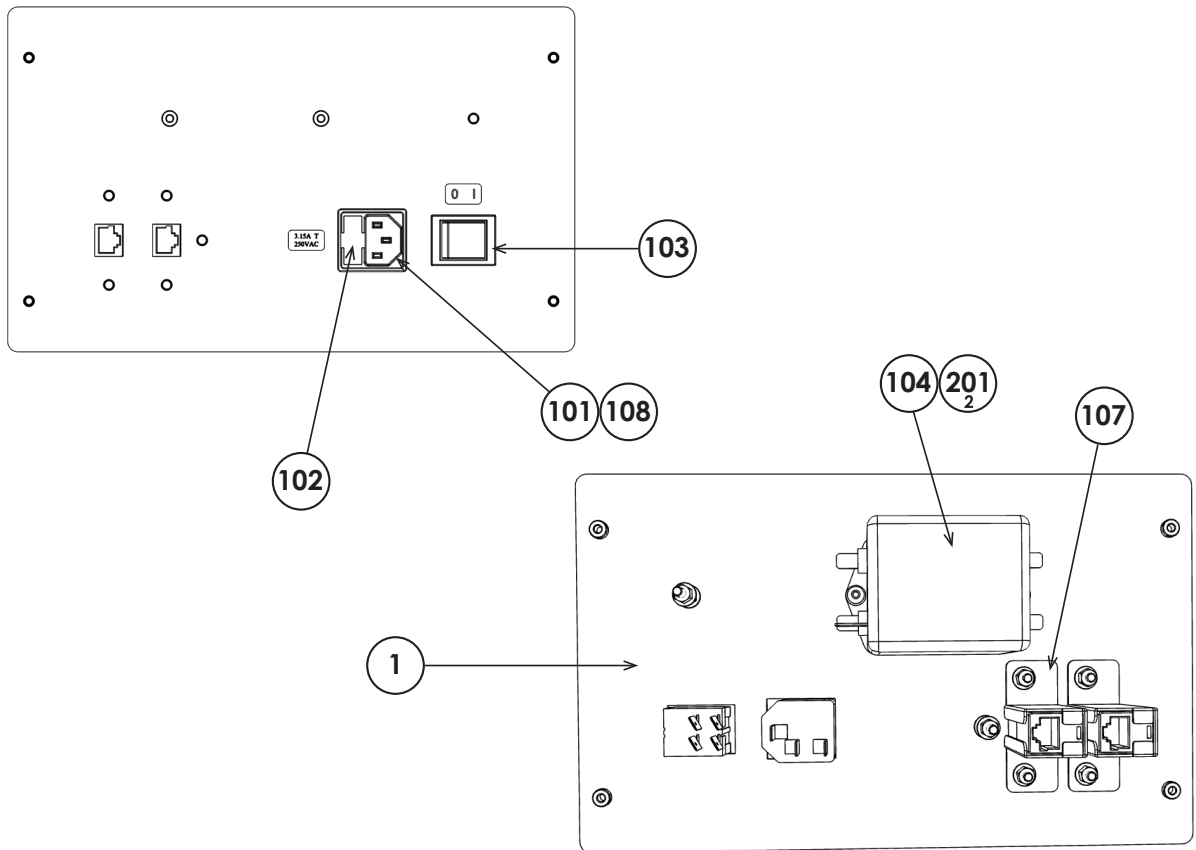
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DA-7281UK	BRKT SCREEN LOWER	1
***2	DA-1272UK	BRKT LCD SUPPORT TOP	1
***3	TRF-1210UK	PNL PRISMA BD DMODUL MNT 55	2
***4	TRF-1207UK	COVER PRISMA BD DMODUL	1
***6	DA-7282UK	BRKT SCREEN UPPER	1
***101	200-6043-02-AUO	43" LCD AUO P430HVN01.4	1
***102	OS1247	ALUMINIUM STICKY CLIP ASK-3	2
***103	280-A01264-WX	ROUTER TWIST D12 SO6.4 WOOD XL	13
***104	OS1230	FOAM STRIP 2mm X 10mm	3.3
***105	280-0017UK	SPACER 6.4OD 3.7ID 11.1L	10
***106	EP1419	FILTER SCHAFFNER FN2030-16-06	1
***109	201-6043-02-AUO	KIT DISPLAY PSU AD	1
***201	029-B00305	M3X5 SKT BH PAS	7
***202	060-S00300-OB	M3 WSHR SPR BLK	7
***203	060-F00300-OB	M3 WSHR FORM A FLT BLK	7
***204	029-B00412	M4X12 SKT BH PAS	6
***205	060-S00400	M4 WSHR SPR PAS	2
***206	068-441616	M4 WSHR 16OD FLT PAS	6
***207	029-B00620	M6X20 SKT BH PAS	4
***208	068-652016	M6 WSHR 20OD FLT PAS	4
***209	012-P00320	N4X3/4" S/TAP PAN PAS	10

⑩ ASSY DOWNLIGHTER (DR-1050UK)



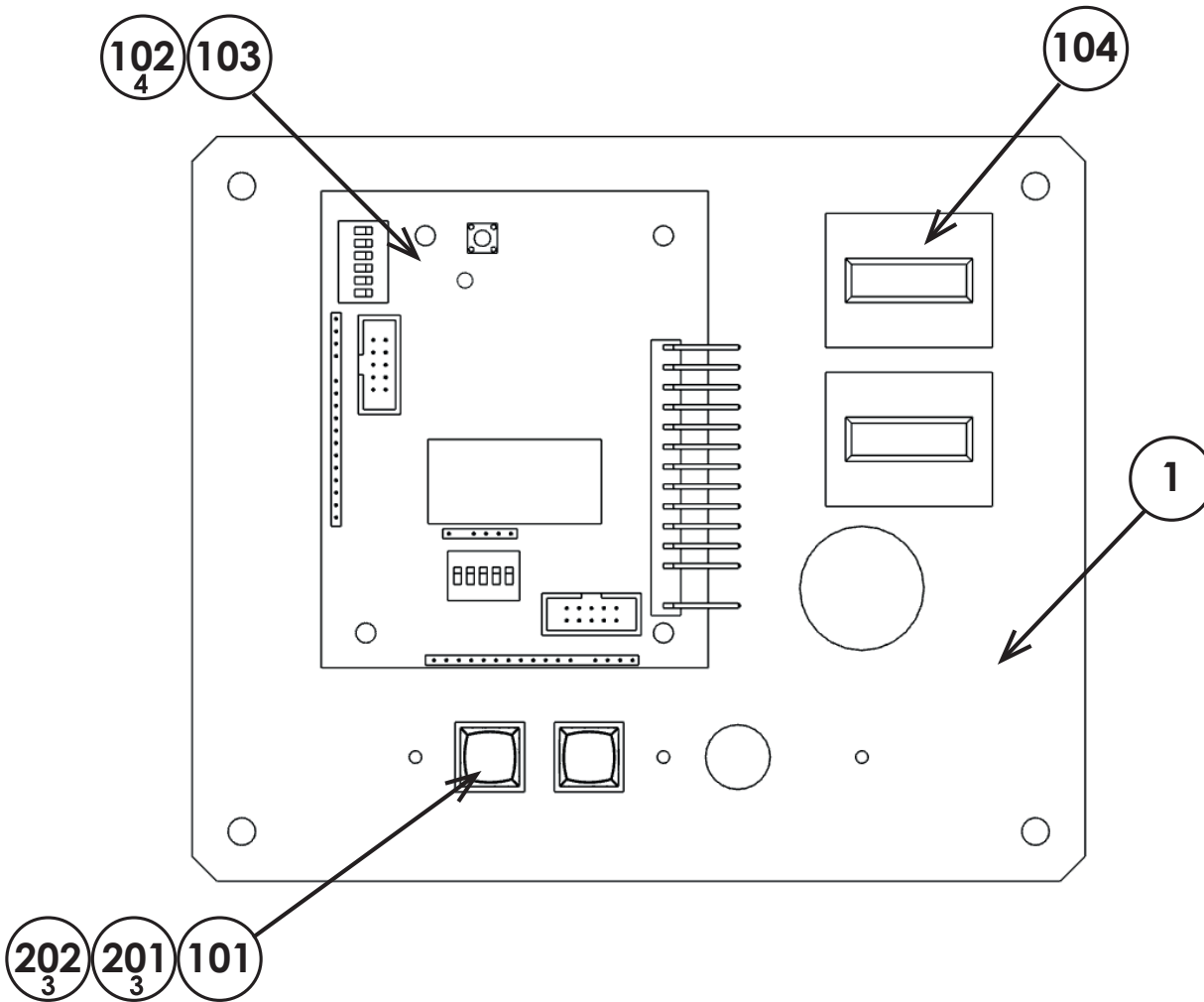
ITEM NO	PART NO	DESCRIPTION	QTY
**1	HP-1051UK	BASE DOWNLIGHTER	1
**2	HP-1052UK	BRKT DOWNLIGHTER MOUNT	2
**3	HP-1053UK	COVER DOWNLIGHTER	1
**101	SAI-6101-0950UK	RGB LONG 950mm	1
**201	O12-P03512-F	N6X1/2" S/TAP FLG PAS	14

11 ASSY AC UNIT (DR-1080UK)



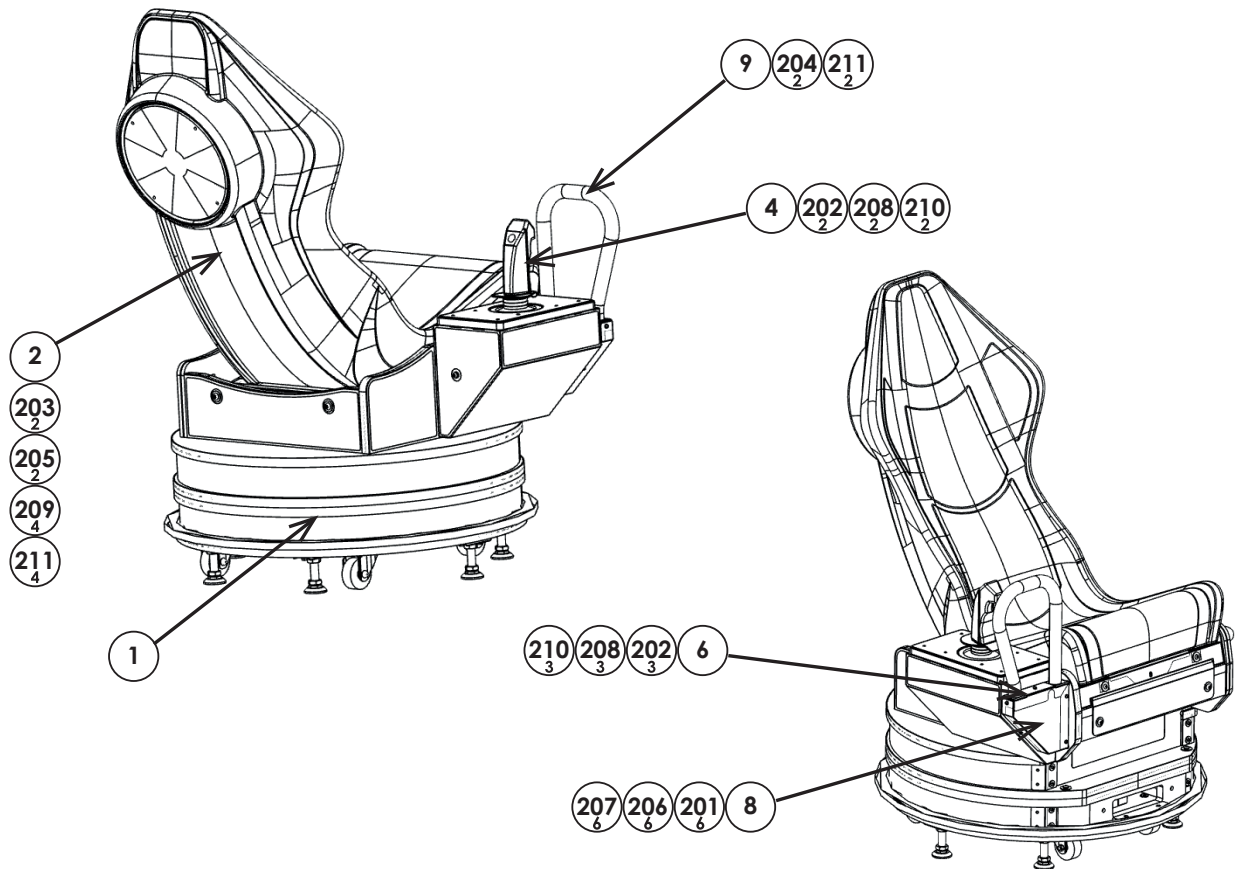
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DA-1081UK	PLATE AC	1
***2	TFF-0402UK	CONN COVER	2
***101	EP1302	EUROSOCKET FUSED 10A 250VAC	1
***102	514-5078-3150	FUSE 3.15 X 20 CERAMIC SB 3150mA	2
***103	SW1109	SWITCH ROCKER 250V AC	1
***104	EP1419	FILTER SCHAFFNER 2030-16-06	1
***107	EP1391	COUPLER INLINE LAN RJ45	2
***108	310-5029-D508	HEAT SHRINK SLEEVING 50.8DIA	10
***201	029-B00408	M4X8 SKT BH PAS	2
***202	050-F00400	M4 NUT FLG SER PAS	6
***203	060-S00400	M4 WSHR SPR PAS	2
***301	MI-60001UK	WH AC IN	1

12 ASSY SW UNIT (MI-1550UK)



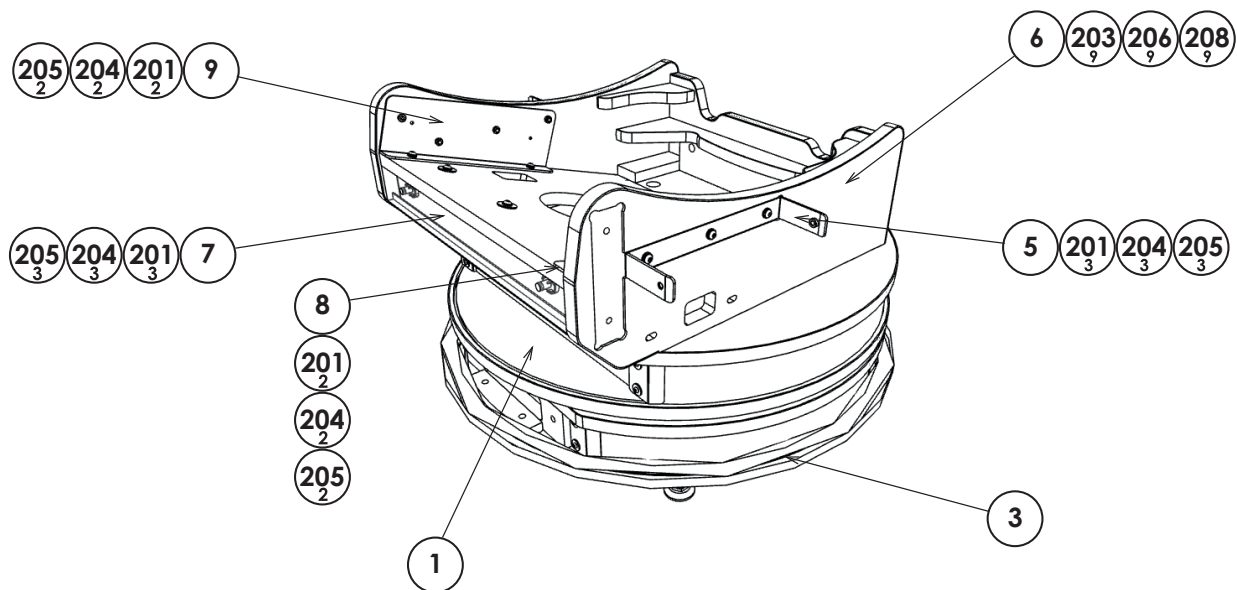
ITEM NO	PART NO	DESCRIPTION	QTY
***1	MI-1551UK	BRKT SW USB DUAL METER+AMP	1
***101	838-14548-01UK	SW & VOL CTL BD	1
***102	280-L00706-PM	STANDOFF 6.4MM HOLE PM	4
***103	EP1380-01	CREDIT BOARD EXCEL	1
***104	220-5643UK	COIN METER SMALL 12V	2
***105	OS1247	ALUMINIUM STICKY CLIP ASK-3	1
***107	OS1098	CRIMP BELL END SMALL	4
***108	601-0460	CABLE TIE NYLON 100MM	2
***201	000-P00308	M3X8 MSCR PAN PAS	3
***202	068-330808-PN	M3 WSHR 80D FLT NYLON	3
***301	MI-60014UK	WH COIN HANDLING	1

13 ASSY SEAT CABINET (DR-3000UK)



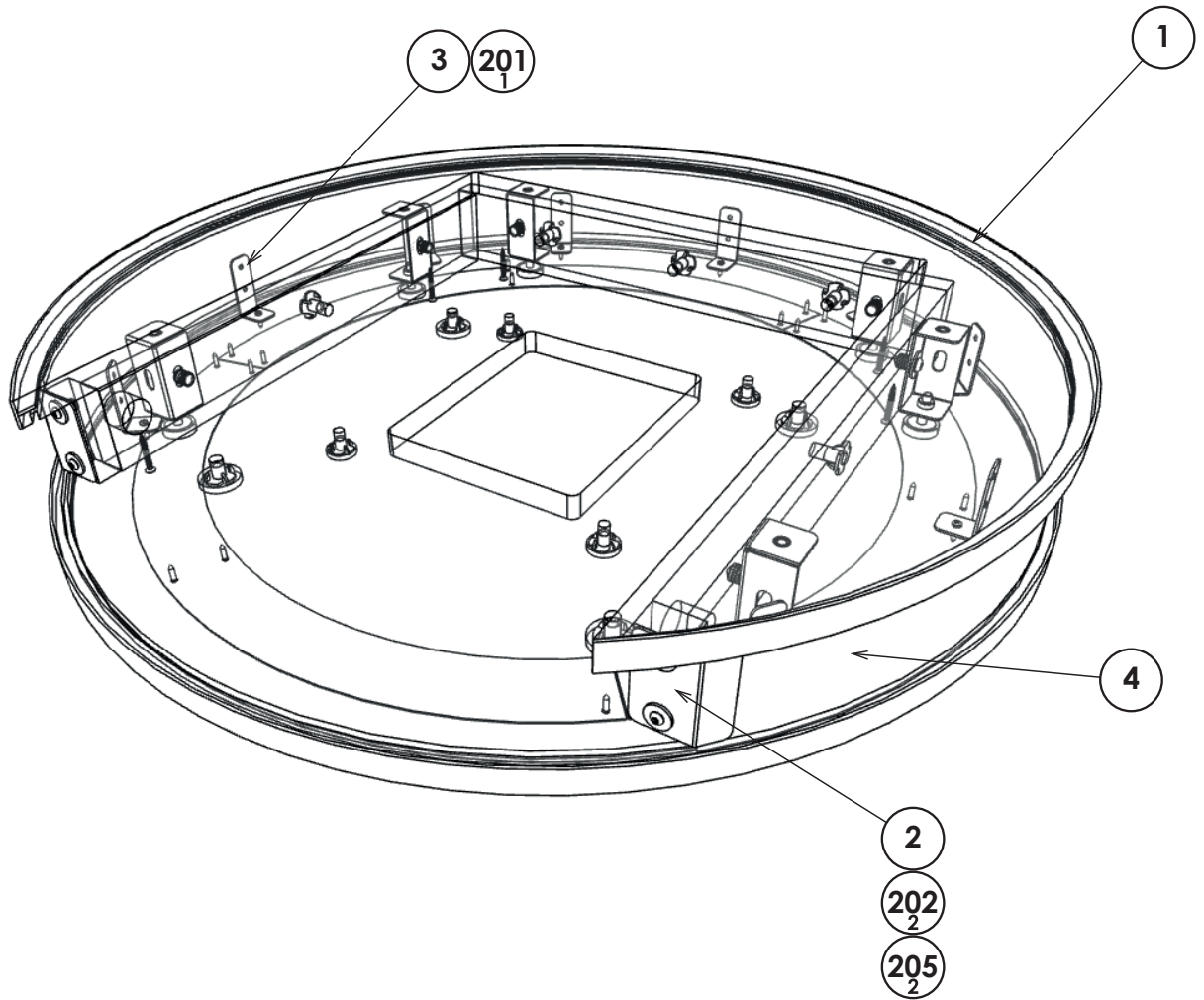
ITEM NO	PART NO	DESCRIPTION	QTY
**1	DR-3001UK	ASSY SEAT PEDESTAL	1
**2	DR-3050UK	ASSY SEAT UPPER BODY	1
**4	DR-3070UK	ASSY JOYSTICK	1
**6	DR-3022UK	BRKT PIPE MOUNT RH	1
**8	DR-3024UK	COVER PIPE MOUNT RH	1
**9	DR-3026UK	PIPE SEAT	2
**201	029-B00412-OB	M4X16 SKT BH BLK	8
**202	029-B00612-OB	M6X12 SKT BH BLK	5
**203	029-B00825-OB	M8X25 SKT BH BLK	2
**204	029-B00840-OB	M8X40 SKT BH BLK	10
**205	029-B00850-OB	M8X50 SKT BH BLK	2
**206	060-F00400-OB	M4 WSHR FORM A FLT BLK	8
**207	060-S00400-OB	M4 WSHR SPR BLK	6
**208	060-S00600-OB	M6 WSHR SPR BLK	5
**209	060-S00800-OB	M8 WSHR SPR BLK	12
**210	068-652016-OB	M6 WSHR 200D FLT BLK	5
**211	068-852216-OB	M8 WSHR 220D FLT BLK	14
**301	DR-60008UK	WH SEAT CABINET LINK	1
**302	DR-600011UK	WH SEAT SERIAL LIGHTING	1

14 ASSY SEAT PEDESTAL (DR-3001UK)



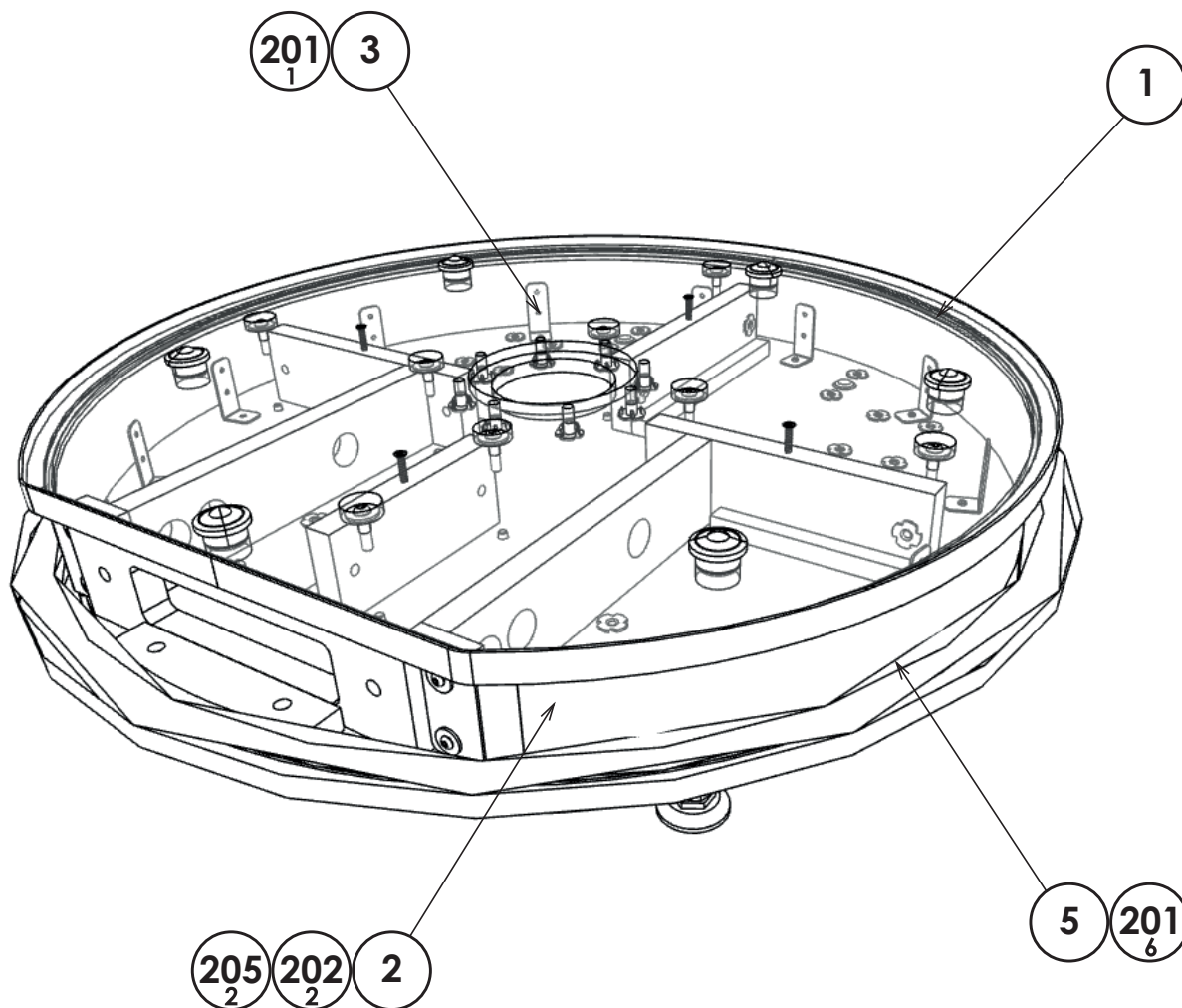
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-3005UK	ASSY PEDESTAL UPPER	1
***3	DR-3015UK	ASSY PEDESTAL LOWER	1
***5	DR-3016UK	MOUNT CONTROLLER	2
***6	DR-3051UK	ASSY SEAT BASE CABINET	1
***7	DR-3056UK	SUPPORT SEAT BASE	1
***8	DR-3057UK	PLATE SEAT BASE LH NUT	1
***9	DR-3058UK	PLATE SEAT BASE RH NUT	1
***201	029-B00630	M6X30 SKT BH PAS	22
***202	029-B00640	M6X40 SKT BH PAS	4
***203	029-B00840	M8X40 SKT BH PAS	9
***204	060-F00600	M6 WSHR FORM A FLT PAS	18
***205	060-S00600	M6 WSHR SPR PAS	22
***206	060-S00800	M8 WSHR SPR PAS	9
***207	068-652016	M6 WSHR 200D FLT PAS	4
***208	068-852216	M8 WSHR 220D FLT PAS	9

15 ASSY PEDESTAL UPPER (DR-3005UK)



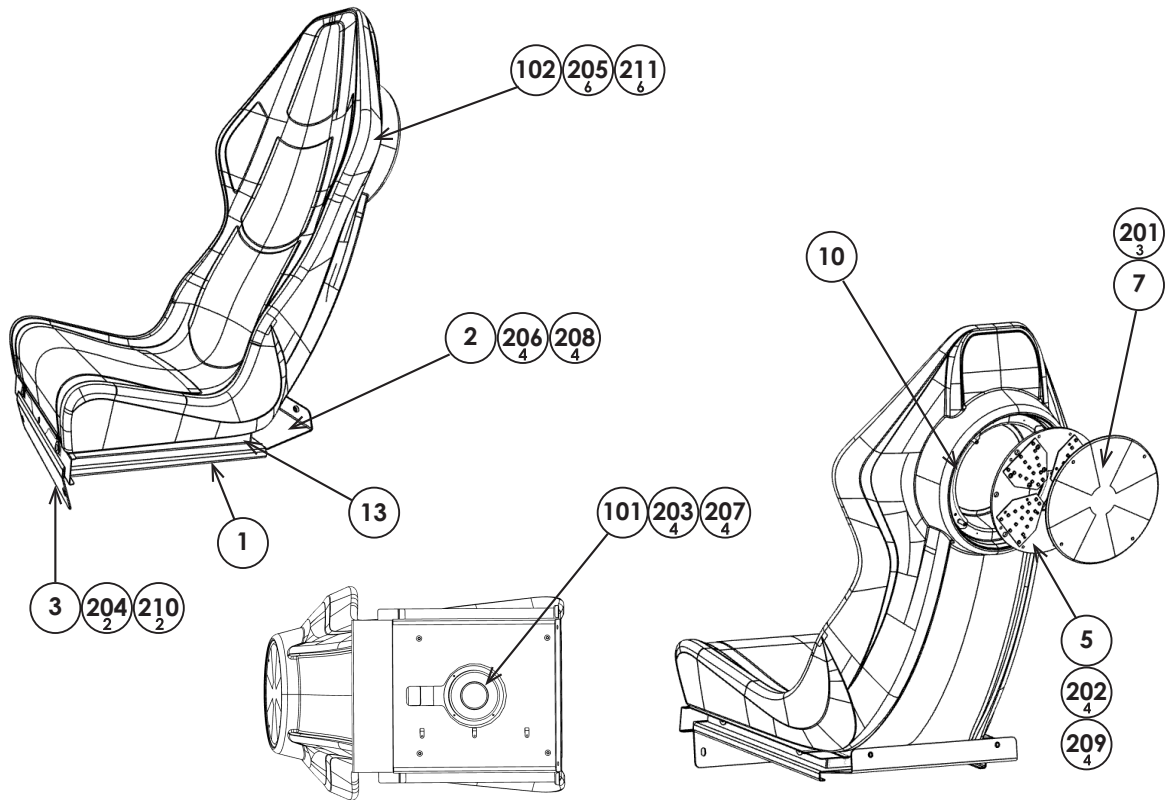
ITEM NO	PART NO	DESCRIPTION	QTY
****1	DR-3002UK	ASSY SEAT PEDESTAL UPPER	1
****2	DR-3008UK	PLATE UPPER LIGHT PANEL	2
****3	DR-3011UK	SUPPORT LED STRIP	9
****4	DR-3012UK	PANEL UPPER LIGHT	1
****6	DR-3014UK	BRKT JOINING	6
****101	SAI-6302-1480UK	SERIAL LONG 1480MM	1
****102	601-0460	CABLE TIE NYLON 100MM	9
****201	012-P00312	N6X1/2" S/TAP PAN PAS	27
****202	029-B00412-OB	M4X12 SKT BH BLK	4
****203	029-B00612	M6X12 SKT BH PAS	6
****204	029-B00625	M6X25 SKT BH PAS	6
****205	068-441616-OB	M4 WSHR 16OD FLT BLK	4
****206	068-652016	M6 WSHR 20OD FLT PAS	12

16 ASSY PEDESTAL LOWER (DR-3015UK)



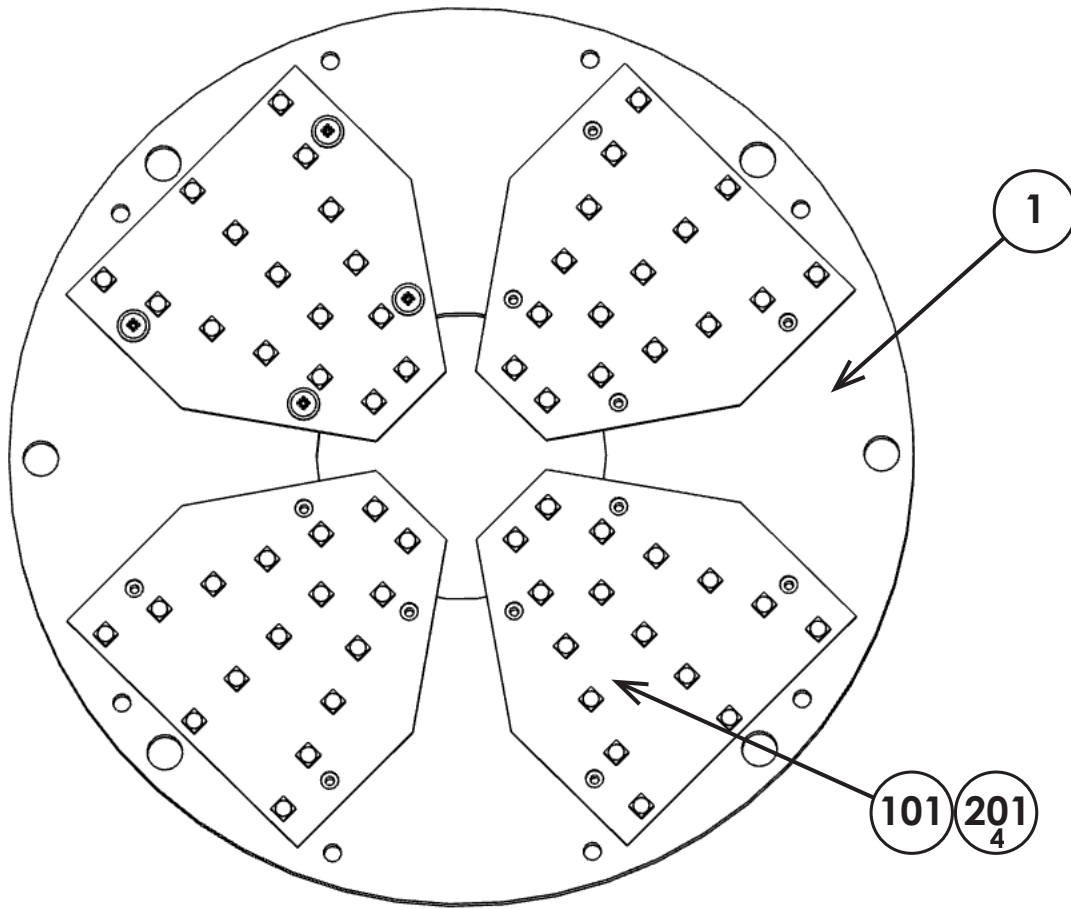
ITEM NO	PART NO	DESCRIPTION	QTY
****1	DR-3003UK	ASSY SEAT PEDESTAL LOWER	1
****2	DR-3008UK	PLATE UPPER LIGHT PANEL	2
****3	DR-3011UK	SUPPORT LED STRIP	10
****4	DR-3014UK	BRKT JOINING	8
****5	DR-3012UK	PANEL UPPER LIGHT	1
****102	SAI-6302-1480UK	SERIAL LONG 1480MM	1
****201	012-P00312	N6X1/2" S/TAP PAN PAS	27
****202	029-B00412-0B	M4X12 SKT BH BLK	4
****204	029-B00625	M6X25 SKT BH PAS	12
****205	068-441616-0B	M4 WSHR 16OD FLT BLK	4
****206	068-652016	M6 WSHR 20OD FLT PAS	12

17 ASSY SEAT UPPER BODY (DR-3050UK)



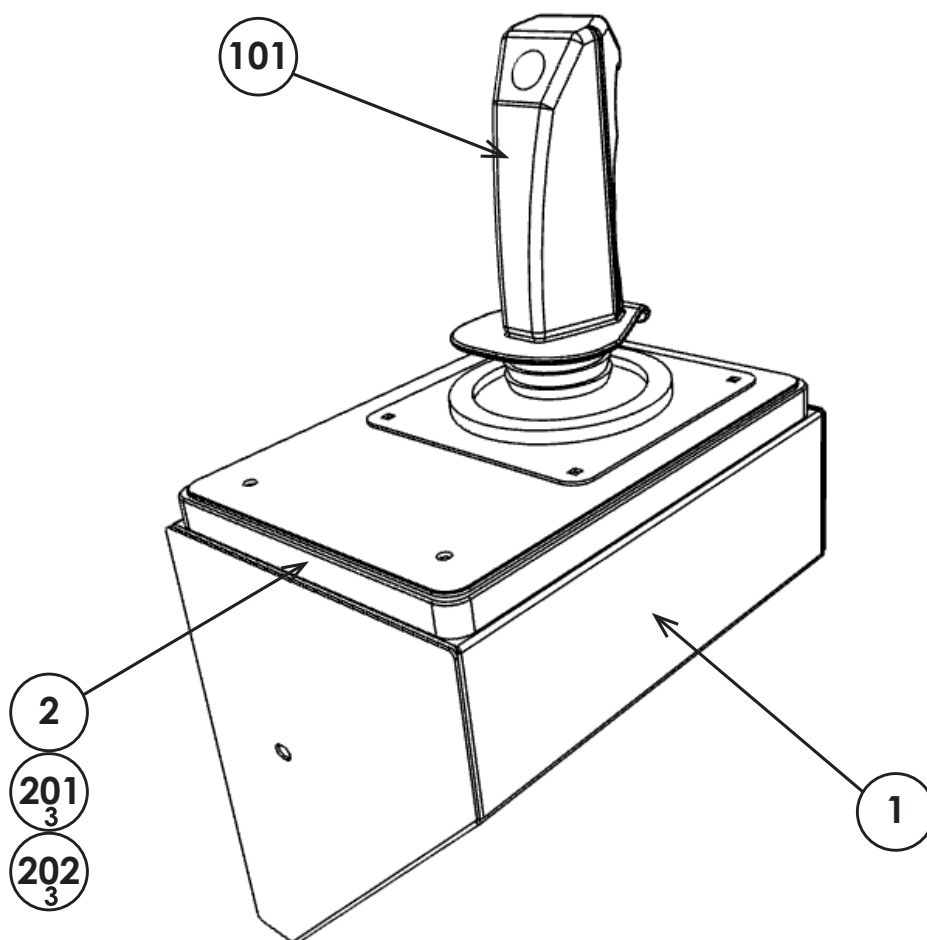
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-3052UK	SEAT MOUNT TRAY	1
***2	DR-3053UK	SEAT BASE	1
***3	DR-3054UK	PLATE SEAT BASE FRONT	1
***5	DR-3055UK	ASSY SEAT REAR LED	1
***7	DA-7723UK	PLATE SEAT REAR DISC	2
***10	DR-3038UK	DISC SEAT REAR	1
***13	DR-3046UK	SKIRT SEAT TRAY	1
***101	130-04050-BSX	BASS SHAKER 4OHM 50W BSX 130 WP	1
***102	PD-1601-A	SEAT	1
***103	601-0460	CABLE TIE 100MM	8
***104	OS1198	P CLIP 11MM	3
***201	012-P03512-FB	N6x1/2" S/TAP FLG BLK	10
***202	029-B00412	M4X12 SKT BH PAS	4
***203	029-B00412-OB	M4X16 SKT BH BLK	4
***204	029-B00612-OB	M6X12 SKT BH BLK	2
***205	029-B00816-OB	M8X16 SKT BH BLK	6
***206	029-B00825-OB	M8X25 SKT BH BLK	4
***207	060-F00400-OB	M4 WSHR FORM A FLT BLK	4
***208	060-S00800-OB	M8 WSHR SPR BLK	4
***209	068-441616	M4 WSHR 16OD FLT PAS	4
***210	068-652016-OB	M6 WSHR 20OD FLT BLK	2
***211	068-852216-OB	M8 WSHR 22OD FLT BLK	6
***301	DR-60012UK	WH BASS SHAKER	1

18 ASSY SEAT REAR LED (DR-3055UK)



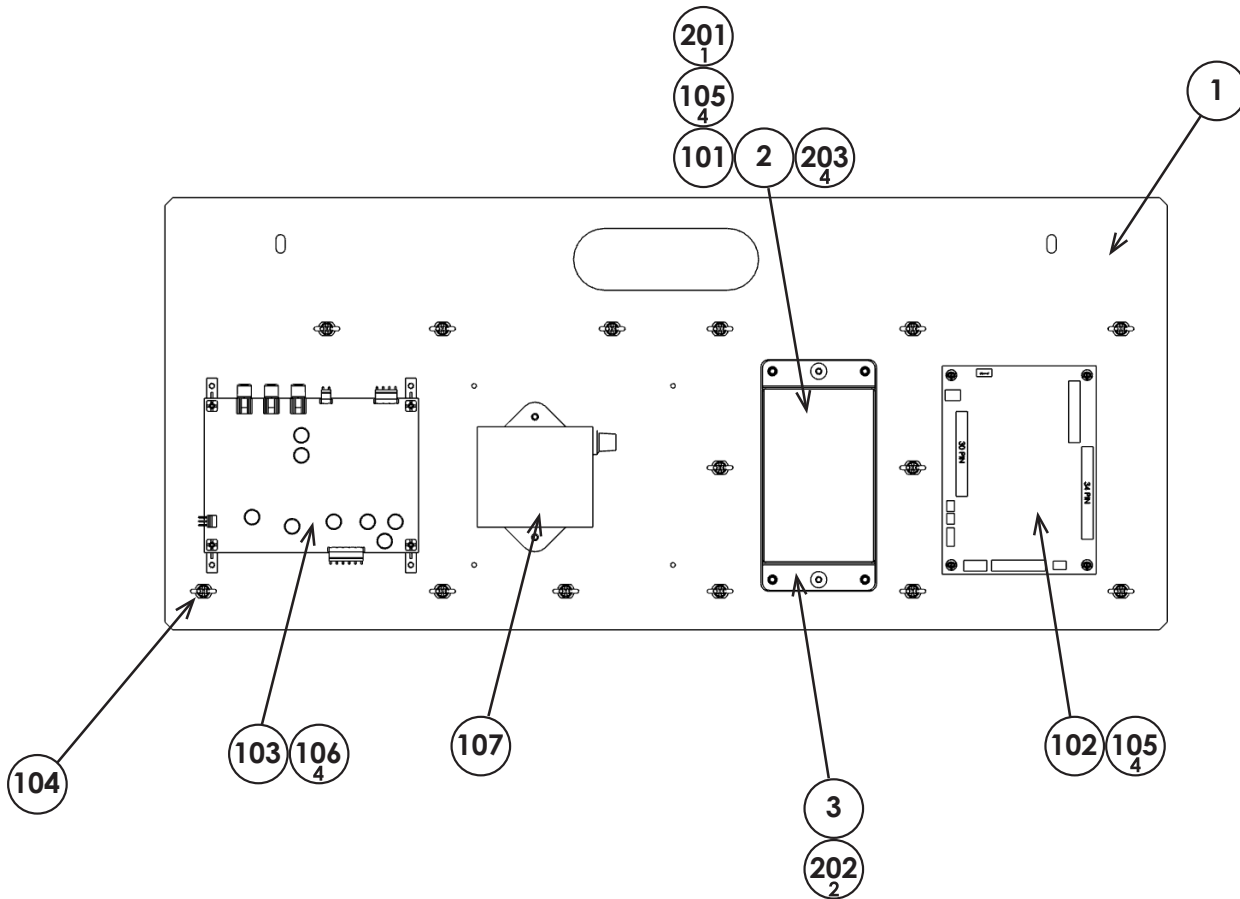
ITEM NO	PART NO	DESCRIPTION	QTY
****1	DR-3059UK	DISC SEAT REAR LED MOUNT	1
****101	838-0055UK	PCBA LED QUADRANT	4
****201	012-P03512-FB	N6x1/2" S/TAP FLG BLK	16
****301	DR-60013UK	WH SEAT BACK SERIAL	1

19 ASSY JOYSTICK (DR-3070UK)



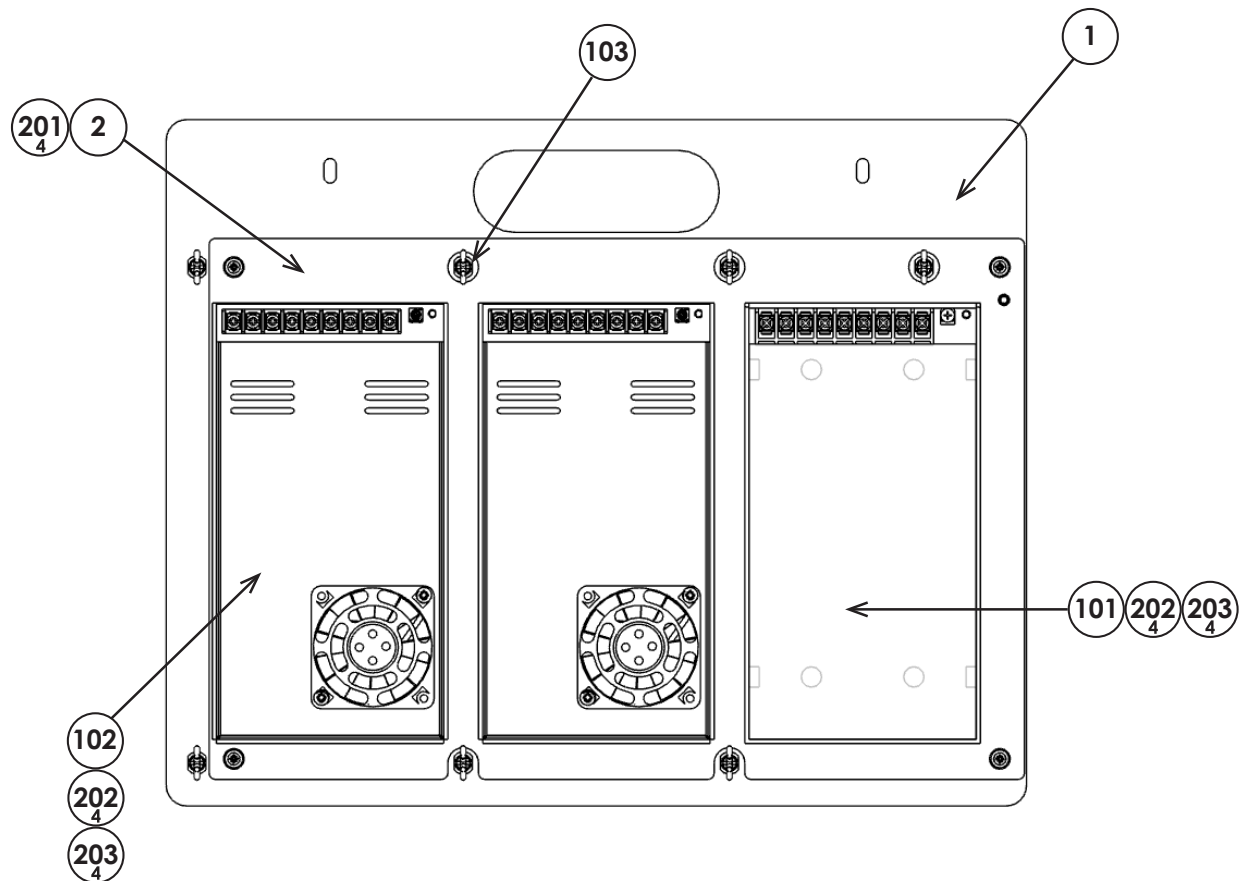
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-3071UK	MOUNT JOYSTICK	1
***2	DR-3072UK	PANEL JOYSTICK LIGHTING	1
***101	601-0009-01UK	CONTROLLER JOYSTICK	1
***102	SAI-6101-0800UK	RGB LONG 800MM	1
***201	020-B00425	M4x25 SKT BH PAS	6
***202	060-F00400	M4 WSHR FORM A FLT PAS	6
***301	DR-60009UK	WH JOYSTICK	1

20 ASSY MAIN ELEC (DR-4000UK)



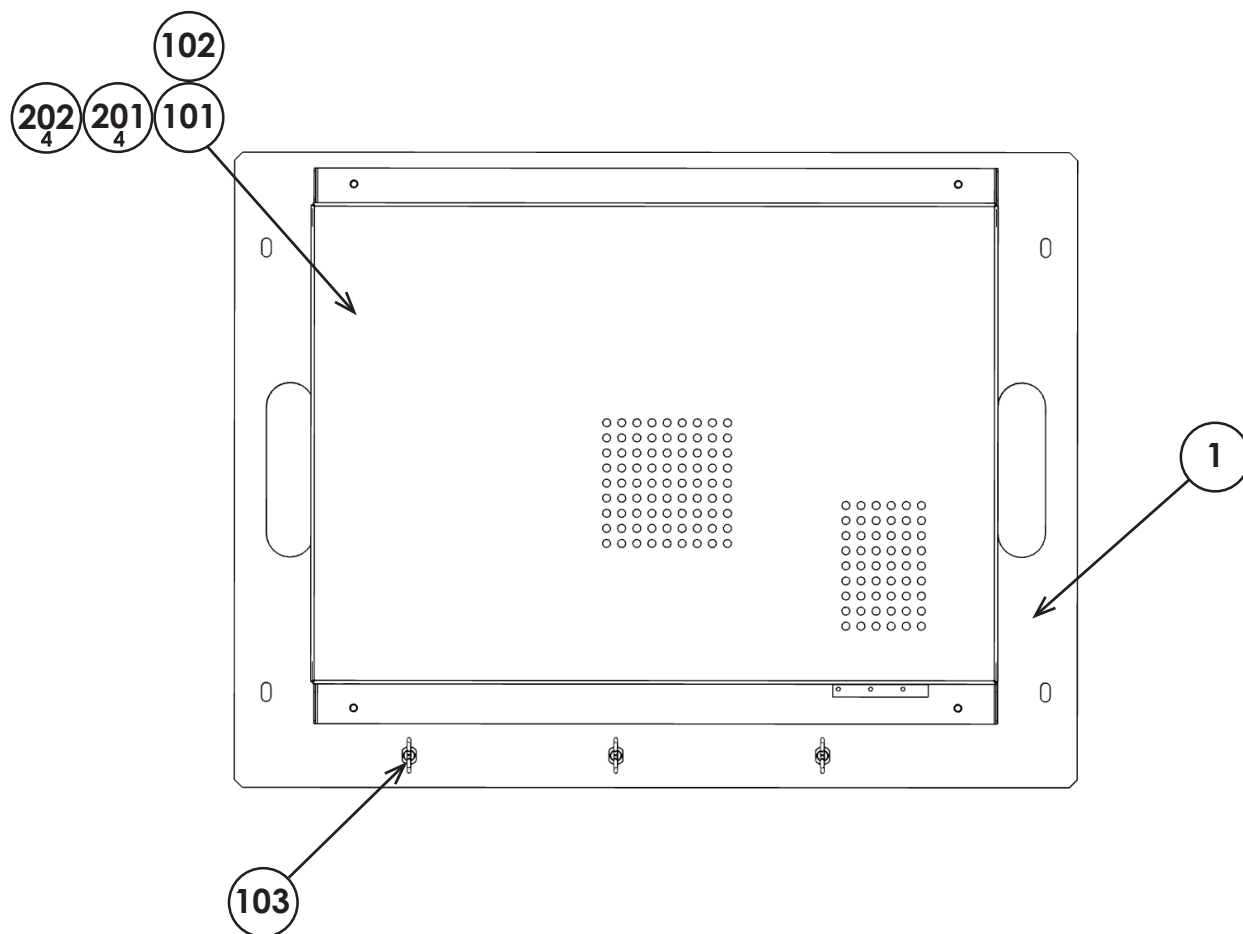
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-4001UK	BOARD ELEC	1
***2	MB-1053UK	BOX WOOFLY COVER	1
***3	MB-1057UK	PLATE BASE WOOFLY COVER	1
***101	838-0053UK	PCBA WOOFLY3	1
***102	838-0042UK	PCBA IO2	1
***103	838-0043UK	PCBA AMP 3CH	1
***104	280-A012640-WX	ROUTER TWIST D12 S06.4 WOOD XL	14
***105	280-L00640-WX	STANDOFF 6MM WOOD XL	8
***106	OS1011	PCB FEET RICHCO LCBS-L-5-01	8
***107	838-8001UK	AMP 2.2 VISATON	1
***201	012-P03506-F	N6X1/4" S/TAP FLG PAS	8
***202	012-P03512-F	N6X1/2" S/TAP FLG PAS	2
***203	050-F00400	M4 NUT FLG SER PAS	4
***301	DR-60003UK	WH BOARD ELEC	1

21 ASSY PSU ELEC (DR-4100UK)



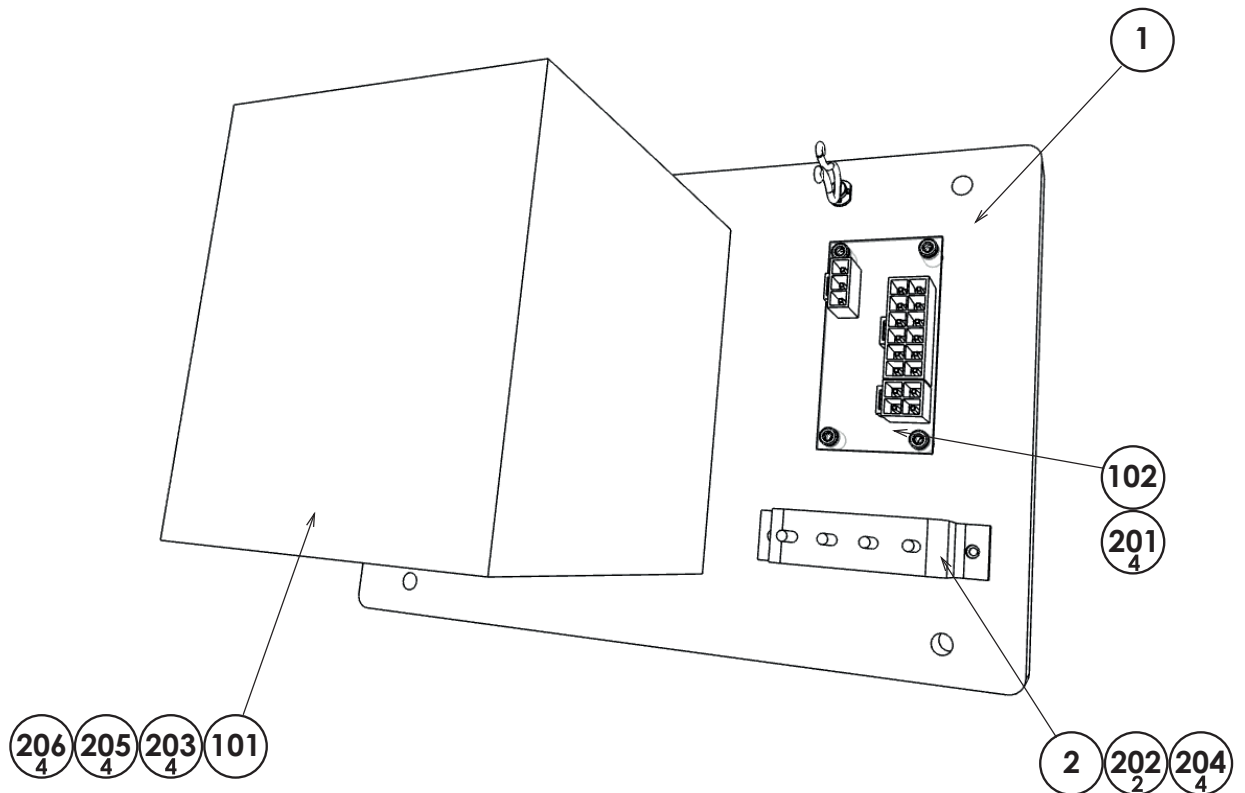
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-4101UK	BOARD PSU	1
***2	DR-4102UK	PLATE PSU	1
***101	400-200-005-02	PSU 5VDC 200W RSP-200-05	1
***102	400-320-012-01	PSU 12VDC 320W RSP-320-12	2
***103	280-A012640-WX	ROUTER TWIST D12 S06.4 WOOD XL	7
***201	012-P03512-F	N6X1/2" S/TAP FLG PAS	4
***202	029-B00416	M4X16 SKT BH PAS	12
***203	068-441616	M4 WSHR 16OD FLT PAS	12
***301	DR-60001UK	WH AC DISTRIBUTION OUT	1
***302	DR-60002UK	WH AC DISTRIBUTION	1

22 ASSY MAIN BD (DR-4200UK)



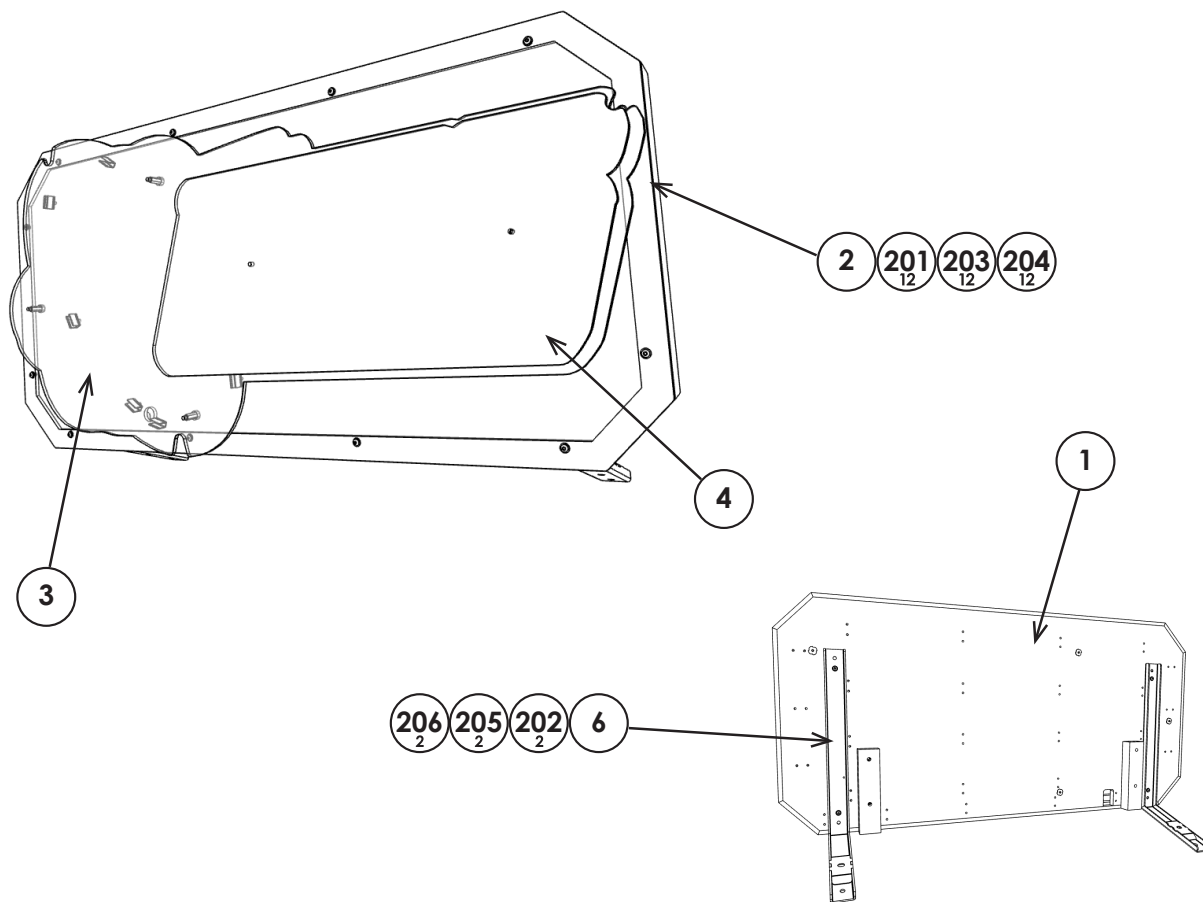
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-4201UK	BOARD MAIN	1
***101	610-0016-01UK	ASSY PC HIGH SPEC CI 44012	1
***102	EP3004-00BL	DK DR STD EU/US BLU	1
***103	280-A020640-WX	ROUTER TWIST D20 S06.4 WOOD XL	3
***201	029-B00412	M4X12 SKT BH PAS	4
***202	068-441616	M4 WSHR 16OD FLT PAS	4
***301	600-7011-0200UK	CA DVI TO DVI 200CM	1
***302	600-7142-200UK	ASSY USB CABLE	1
***303	600-7158-0150UK	CA AUDIO RCA TO RCA 150CM	2
***304	600-7269-0200UK	ASSY LAN CABLE 0200CM	1
***305	MI-60027UK	WH JACK TO RCA	2

23 ASSY XFMR BD (DR-4300UK)



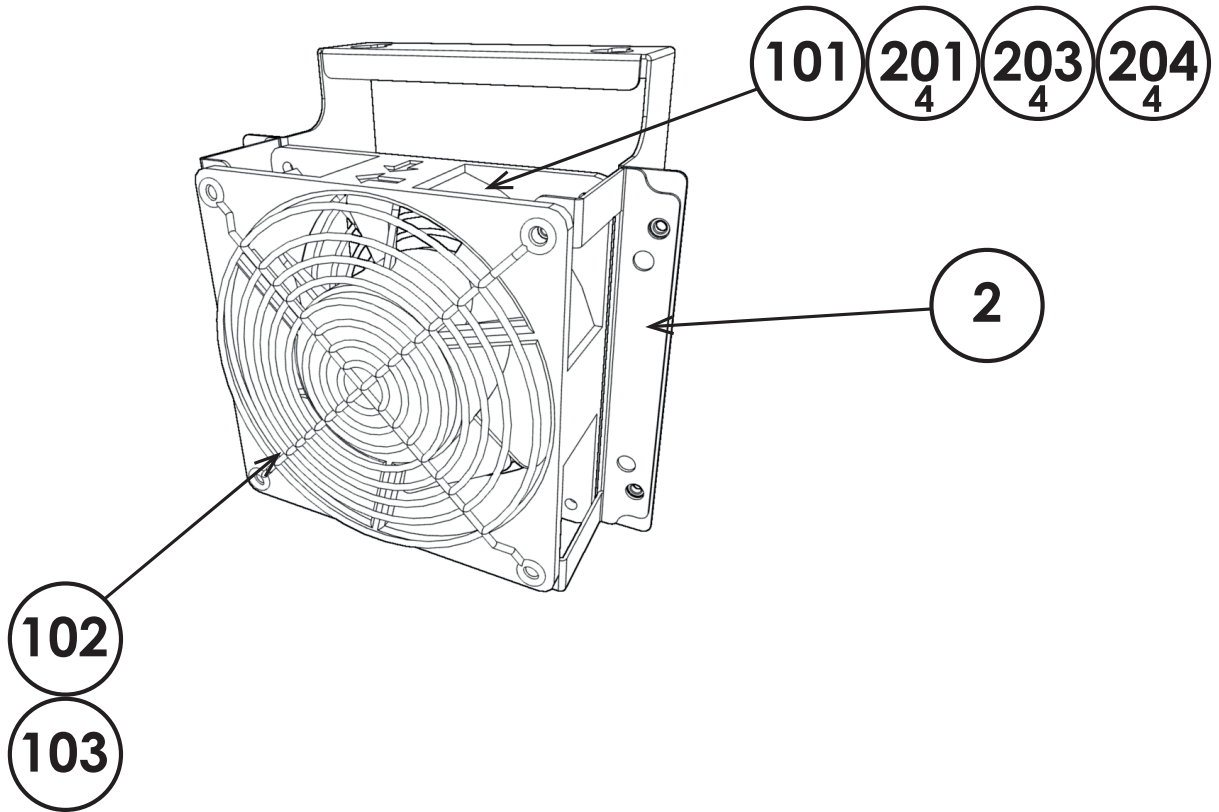
ITEM NO	PART NO	DESCRIPTION	QTY
***1	HDZ-4301XUK	BOARD XFMR	1
***2	CFB-4003-01UK	EARTH TERMINAL PLATE	1
***101	560-1111-02UK	XFMR US BLOCK 800VA ST800-11-11	1
***102	838-14551-02UK	AC DISTRIBUTION BD	1
***201	012-P00325	N4X1" S/TAP PAN PAS	4
***202	012-P03512-F	N6X1/2" S/TAP FLG PAS	2
***203	029-B00616	M6X16 SKT BH PAS	4
***204	050-F00400	M4 NUT FLG SER PAS	4
***205	060-S00600	M6 WSHR SPR PAS	4
***206	068-652016	M6 WSHR 200D FLT PAS	4
***301	MB-60002UK	WH AC DIST TO GAMEBOARD	1
***302	MSJ-60002UK	WH TRANSFORMER	1
***303	MSJ-60003UK	WH AC DISTRIBUTION IN	1

24 ASSY BILLBOARD (DR-5000UK)



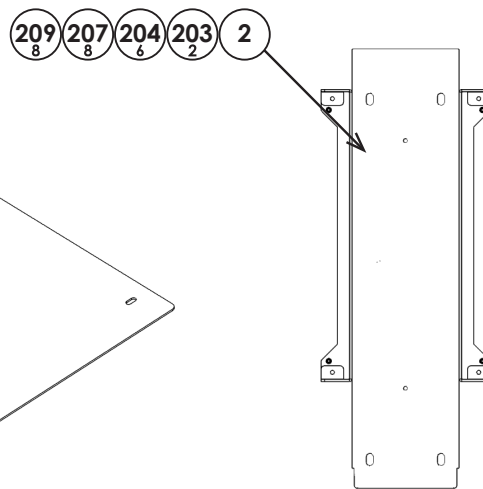
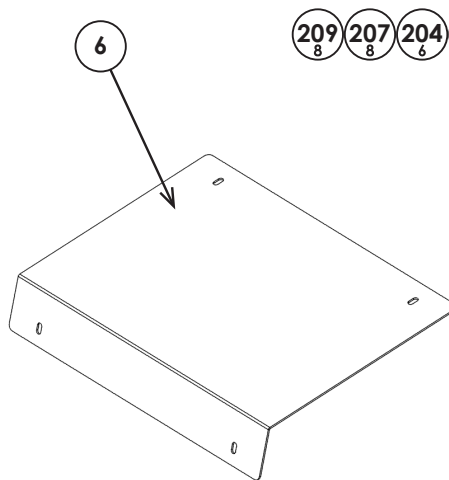
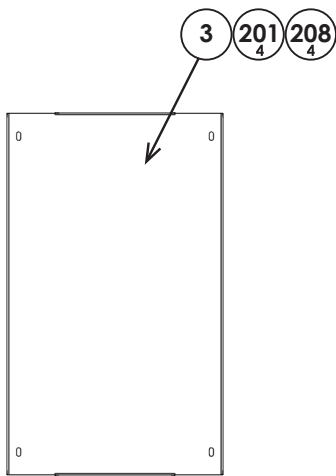
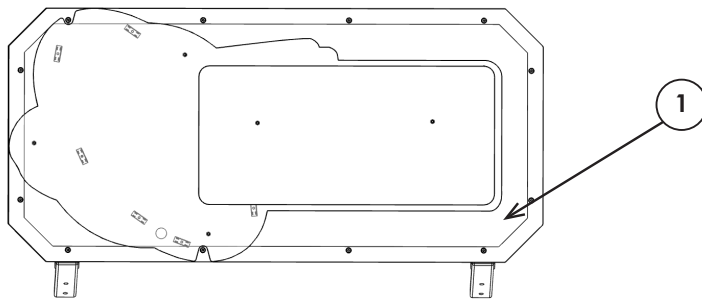
ITEM NO	PART NO	DESCRIPTION	QTY
***1	DR-5001UK	BOX BB REAR	1
***2	DR-5002UK	BORDER PANEL	1
***3	DR-5003UK	DRONE PANEL	1
***4	DR-5004UK	NAMESTYLE PANEL	1
***6	DR-5007UK	BRKT BILLBOARD LOCATING	2
***101	SAI-6603-825UK	LED LONG RIGID WHITE 825MM	4
***102	SAI-6307-1196UK	NEON SERIAL LONG 1196mm	1
***103	601-0460	CABLE TIE NYLON 100MM	28
***104	280-0021UK	M4 SPACER HEX 7AF 25L PAS	7
***201	029-B00425	M4X25 SKT BH PAS	12
***202	029-B00625	M6X25 SKT BH PAS	4
***203	060-F00400	M4 WSHR FORM A FLT PAS	12
***205	060-S00600	M6 WSHR SPR PAS	4
***206	068-652016	M6 WSHR 200D FLT PAS	4
***207	029-B00316	M3X16 SKT BH PAS	7
***301	DR-60006UK	WH BILLBOARD LIGHTING	1

25 ASSY MONITOR FAN (HDZ-1010XUK)

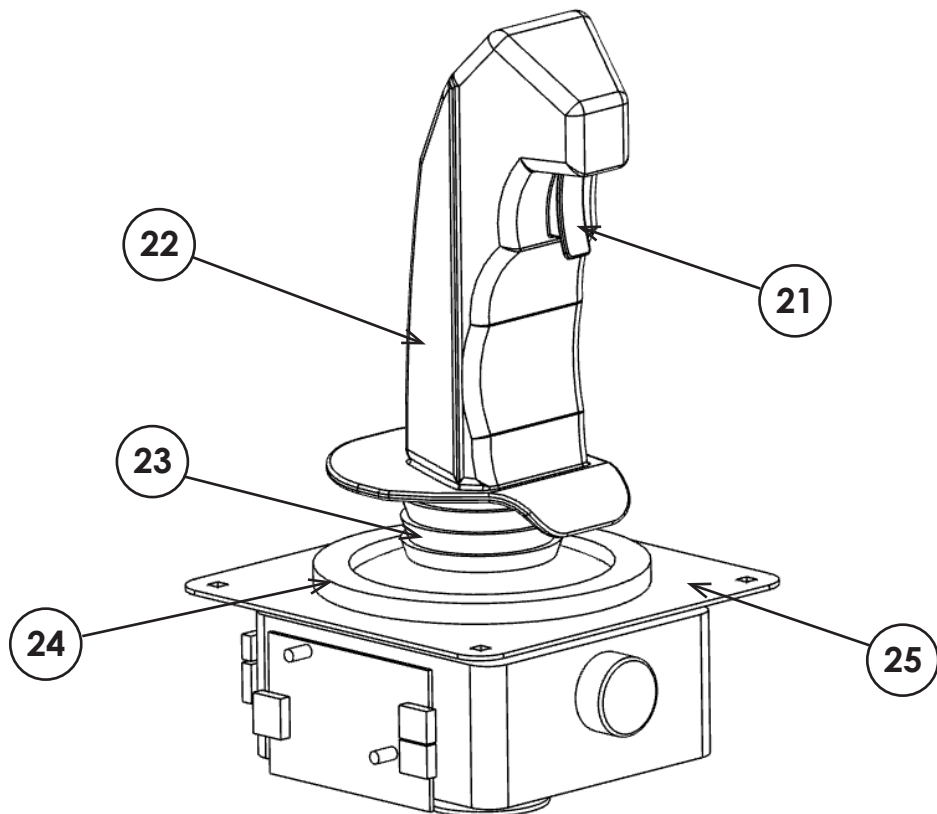
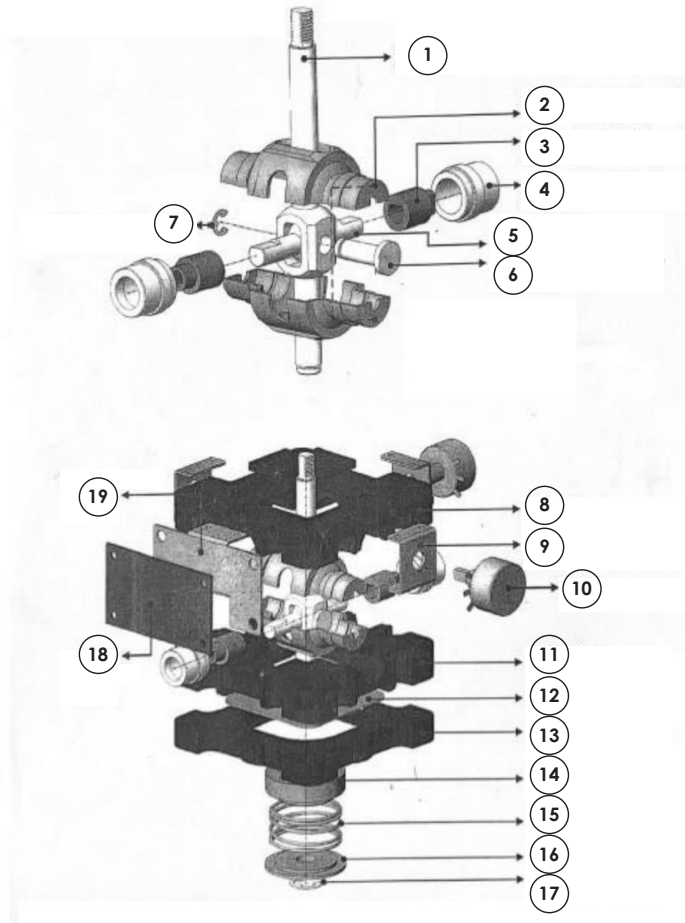


ITEM NO	PART NO	DESCRIPTION	QTY
***2	HDZ-1013UK	BRKT FAN LOCATING	2
***101	260-0012-01UK	FAN DC 12V AXIAL	1
***102	FN1012	FAN GUARD METAL 120MM (FG-12)	2
***103	OS1195	RIVET SNAP SR-4080B	4
***201	020-B00316-0B	M3X16 SKT BH BLK	4
***203	060-S00300-0B	M3 WSHR SPR BLK	4
***204	060-F00300-0B	M3 WSHR FORM A FLT BLK	4
***301	DB-60030UK	WH LED WHT	1

26 ASSY INST KIT DR STD (DR-INST-STD)



ITEM NO	PART NO	DESCRIPTION	QTY
**1	DR-5000UK	ASSY BILLBOARD	1
**2	DR-0001UK	JOINT BRIDGE	1
**3	DR-0006UK	COVER JOINT BRIDGE	1
**6	DR-0014UK	PLATE JOINT BRIDGE ACCESS	1
**101	LM1227	UK MAINS LEAD 10A WITH PLUG	1
**102	LM1246	EUROLEAD 10A EUROPEAN SOCKET	1
**103	LM1500UK	MAINS LEAD USA/IEC H80-1205-00	1
**201	029-B00412-OB	M4X16 SKT BH BLK	4
**202	029-B00425-OB	M4X25 SKT BH BLK	4
**203	029-B00816-OB	M8X16 SKT BH BLK	2
**204	029-B00840-OB	M8X40 SKT BH BLK	6
**207	060-S00800-OB	M8 WSHR SPR BLK	8
**208	068-441616-OB	M4 WSHR 16OD FLT BLK	8
**209	068-852216-OB	M8 WSHR 22OD FLT BLK	8
**301	RND-60055UK	WH COIN MECHANICAL	1
**401	OS1019	SELF SEAL BAG 9X12.3/4	1



ITEM NO	PART NO	DESCRIPTION	QTY
**1	601-0009-01-01	BEARING SHAFT	1
**2	601-0009-01-02	LEFT/RIGHT RESISTANCE CONNECTOR	1
**3	601-0009-01-03	FORWARD/BACKWARD RESISTANCE BASE	1
**4	601-0009-01-04	FORWARD/BACKWARD RESISTANCE CONNECTOR	1
**5	601-0009-01-05	FORWARD/BACKWARD LINKAGE	1
**6	601-0009-01-06	FORWARD/BACKWARD LINKAGE RETAINER	1
**7	601-0009-01-07	FORWARD/BACKWARD LINKAGE RETAINER CIRCLIP	1
**8	601-0009-01-08	UPPER SEAT	1
**9	601-0009-01-09	POTENTIAL FIXING SEAT	1
**10	601-0009-01-10	POTENTIOMETER	1
**11	601-0009-01-11	LOWER SEAT	1
**12	601-0009-01-12	SPRING RETAINER (TOP)	1
**13	601-0009-01-13	GUIDE FIXED COVER	1
**14	601-0009-01-14	SPRING SEAT	1
**15	601-0009-01-15	SPRING	1
**16	601-0009-01-16	SPRING RETAINER (BTM)	1
**17	601-0009-01-17	SPRING CIRCLIP	1
**18	601-0009-01-18	CONTROL PANEL	1
**19	601-0009-01-19	CONTROL PANEL FIXING SEAT	1
**20	601-0009-01-20	TRIGGER	1
**21	601-0009-01-21	GRIP	1
**22	601-0009-01-22	RUBBER SEAT	1
**23	601-0009-01-23	RUBBER RETAINER	1
**24	601-0009-01-24	FIXED BOTTOM PLATE	1

19 WIRE COLOR CODE TABLE

⚠ WARNING

The DC power wire color for this product is different from previous SEGA titles.
Working from the previous wire colors will create a high risk of fire

19

WIRE COLOUR CODE TABLE

The color codes for the wires used in the diagrams in the following chapter are as follows:

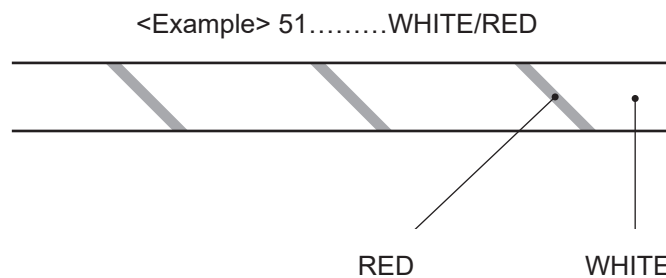
A	PINK
B	SKY BLUE
C	BROWN
D	PURPLE
E	LIGHT GREEN

Wires other than those of any of the above 5 single colors will be displayed by 2 alphanumeric characters:

1	RED
2	BLUE
3	YELLOW
4	GREEN
5	WHITE
7	ORANGE
8	BLACK
9	GRAY

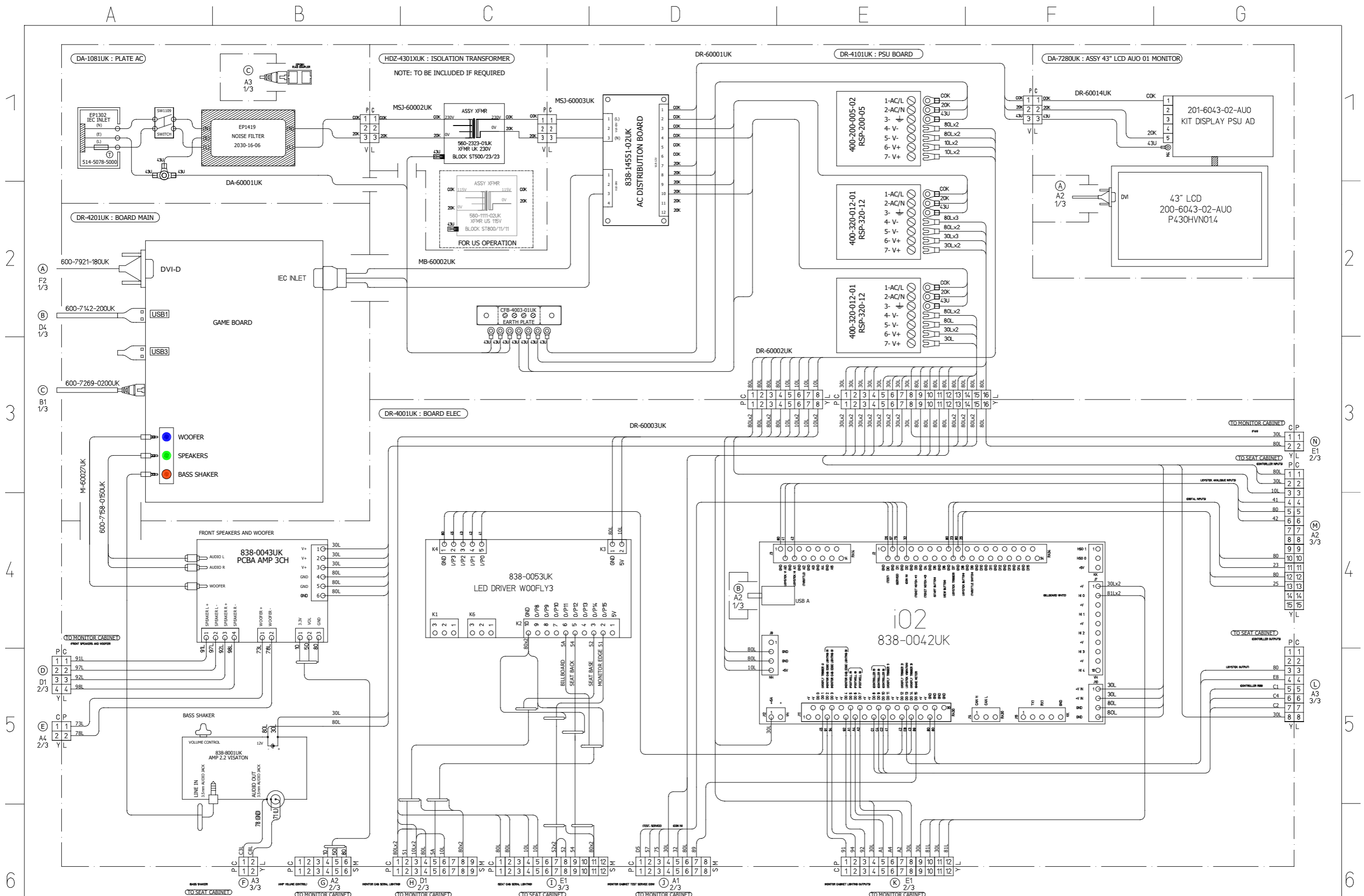
If the right-hand side numeral of the code is 0, then the wire will be of a single color shown by the left-hand side numeral (see the above).

Note 1: If the right-hand side numeral is not 0, that particular wire has a spiral color code. The left-hand side character shows the base color and the right-hand side one, the spiral color.

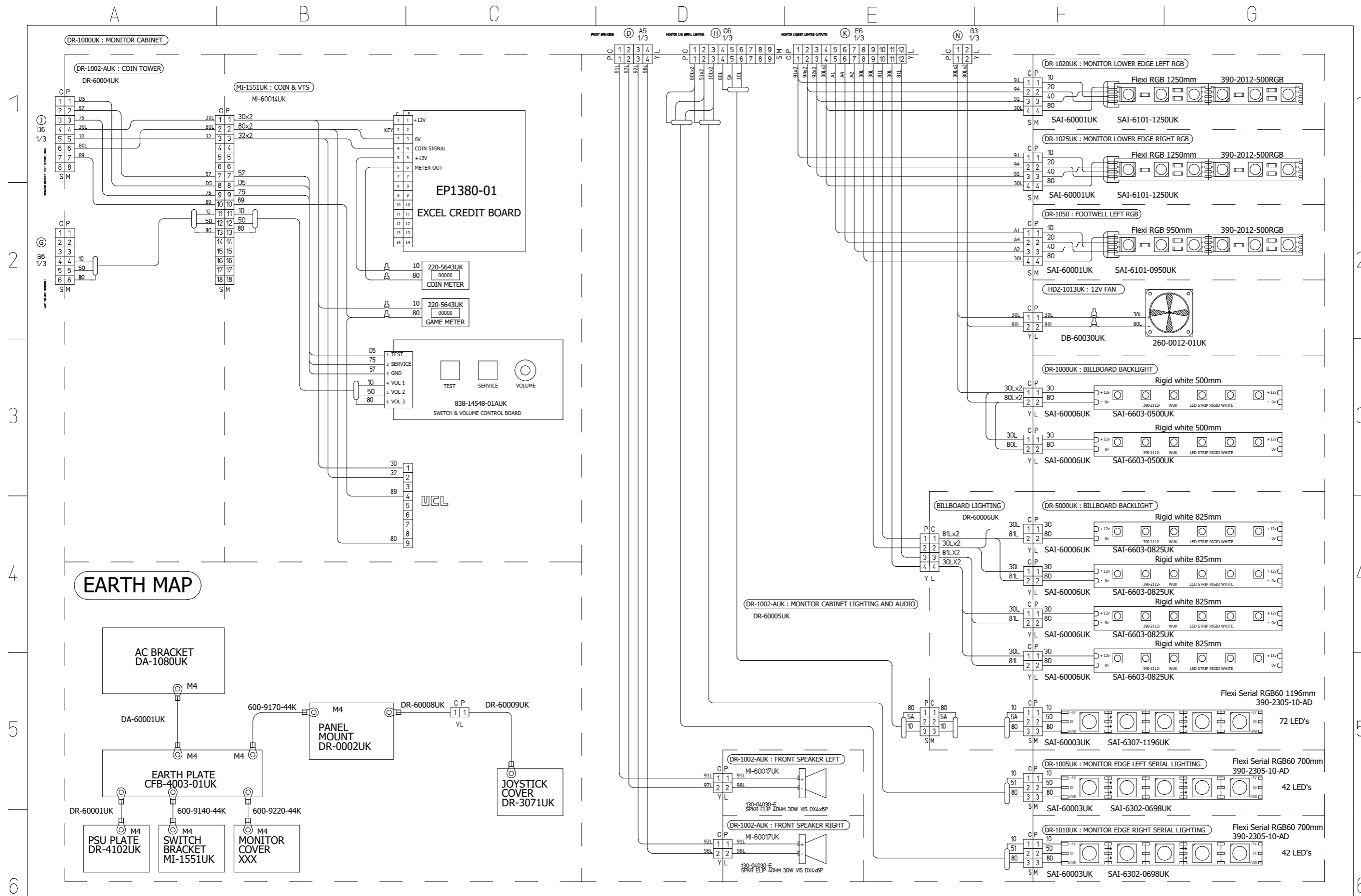


Note 2: The character following the wire color code indicates the size of the wire.

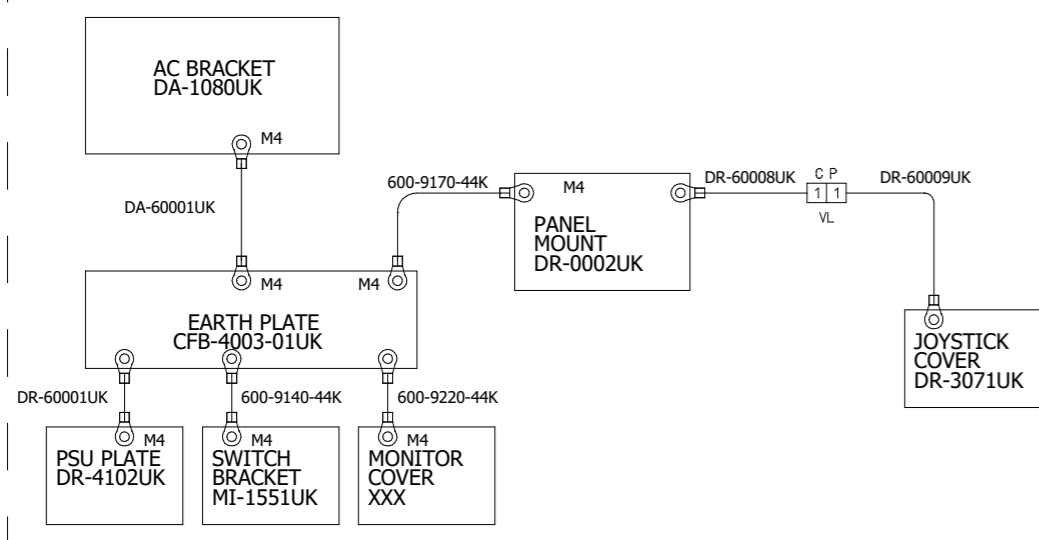
U :	AWG16
K :	AWG18
L :	AWG20
None :	AWG22



ALTERATION		8 BLACK	E LIGHT GREEN	43 EARTH WIRE	DR-0000	30/01/2020	TB	00	SEGA AMUSEMENTS INTERNATIONAL LTD	THIS DRAWING WILL IN NO WAY BE COPIED. TO BE RETURNED ON DEMAND.	PAGE 1/3	SIZE A2
		7 ORANGE	D PURPLE	? AWG18 UL1672								
		5 WHITE	L FURLE	AWG20 UL1672	PART NUMBER		DATE	DRAWN	CHECKED	DESCRIPTION		
		4 GREEN	C BROWN	AWG16 UL1015								
		3 YELLOW	B SKY BLUE	AWG18 UL1015								
		2 BLUE	A PINK	AWG20 UL1007								
		1 RED	9 GRAY	AWG22 UL1007								



EARTH MAP



8	BLACK		43	EARTH WIRE
7	ORANGE	E	?	AWG18 UL1672
5	WHITE	D	?	AWG20 UL1672
4	GREEN	C	U	AWG16 UL1015
3	YELLOW	B	K	AWG18 UL1015
2	BLUE	A	L	AWG20 UL1007
1	RED	9	T	AWG22 UL1007

DR-0000	30/01/2020	TB	00
PART NUMBER	DATE	DRAWN	CHECKED

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ALTERATION

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