

SEGA®



Redemption Version
Owner's Manual



SEGA AMUSEMENTS USA, INC.

MANUAL NO. 999-2186

GAME CODE: SBR

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Now with a new look to make your experience that much easier.

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

To maintain the safety:

To ensure the safe usage of the product, be sure to read the following before using the product. 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 nearby the product or elsewhere convenient for referring to it when necessary.

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



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



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 an equipment, this display is attached to places where the Owner’s Manual and or Service Manual should be referred to.

- **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 serviceman should perform such work.
- **Be sure to turn off power before working on the machine.**
To prevent electric shock, be sure to turn off power before starting the work in which the worker touches 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, however, is not required in the case where a power cord 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 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.**
This product does not incorporate the 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 electric shock.

- **Specification changes (removal of equipment, conversion and addition) 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, 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 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 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 situation 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 the product w/monitor.)**
Some of the monitor (TV) parts are subject to high tension voltage. Even after running off power, some portions are still subject to high tension voltage sometimes. 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 (projector) properly. (Applies only to the product w/monitor.)**
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 the customers.
 - **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 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 Casters 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 direction, connector connections can not be made accurately. Do not insert connectors forcibly.
- Do power cords have cuts and dents?
- Do the fuses used meet specified rating? Is the Circuit Protector in an energized status?
- Are all accessories available?
- Can all Doors and Lids be opened with the Accessory keys? Can Doors and Lids be firmly closed?

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

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SPECIFICATIONS

Installation Space	: 27.25 inches width X 38 inches depth
Height	: 71.5 inches
Width	: 25.25 inches
Length	: 30 inches
Weight	: 315 lbs
Power, maximum current	: 270 W 2.25 A (AC 120V 60 Hz AREA)

MONITOR : No Video Display

INTRODUCTION OF THE OWNERS MANUAL

This Owner's Manual is intended to provide detailed descriptions together with all the necessary information covering the general operation of electronic assemblies, electromechanicals, servicing control, spare parts, etc. as regards the product, **SPONGEBOB SQUAREPANTS MECHANICAL TYPE REDEMPTION GAME**. This manual is intended for the owners, personnel and managers in charge of operation of the product. Operate the product after carefully reading and sufficiently understanding the instructions. If the product fails to function satisfactorily, non-technical personnel should under no circumstances touch the internal system. Please contact where the product was purchased from.

Use of this product is unlikely to cause physical injuries or damages to property. However, where special attention is required this is indicated by a thick line, the word "IMPORTANT" and its sign in this manual.



Indicates that mishandling the product by disregarding this display can cause the product's intrinsic performance not to be obtained, resulting in malfunctioning.

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● PRODUCTION DATE ●

This SEGA product was produced in the year of:

2004

This signifies that this work was disclosed in 2004.

DEFINITION OF LOCATION MAINTENANCE MAN AND SERVICEMAN



Non-technical personnel who do not have technical knowledge and expertise should refrain from performing such work that this manual requires the location's maintenance man or a serviceman to carry out, or work which is not explained in this manual. Failing to comply with this instruction can cause a severe accident such as electric shock.

Ensure that parts replacement, servicing & inspections, and troubleshooting are performed by the location's maintenance man or the serviceman. It is instructed herein that particularly hazardous work should be performed by the serviceman who has technical expertise and knowledge.

The location's maintenance man and serviceman are herein defined as follows:

"Location's Maintenance Man" :

Those who have experience in the maintenance of amusement equipment and vending machines, etc., and also participate in the servicing and control of the equipment through such routine work as equipment assembly and installation, servicing and inspections, replacement of units and consumables, etc. within the Amusement Facilities and or locations under the management of the Owner and Owner's Operators of the product.

Activities of Location's Maintenance Man :

Assembly & installation, servicing & inspections, and replacement of units & consumables as regards amusement equipment, vending machines, etc.

Serviceman :

Those who participate in the designing, manufacturing, inspections and maintenance service of the equipment at an amusement equipment manufacturer.

Those who have technical expertise equivalent to that of technical high school graduates as regards electricity, electronics and or mechanical engineering, and daily take part in the servicing & control and repair of amusement equipment.

Serviceman's Activities :

Assembly & installation and repair & adjustments of electrical, electronic and mechanical parts of amusement equipment and vending machines.

LISTED



AMUSEMENT MACHINE

Notes:

1. HANDLING PRECAUTIONS

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

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



- Before performing work, be sure to turn power off. Performing the work without turning power off can cause an electric shock or short circuit. In the case work should be performed in the status of power on, this manual always states to that effect.
- To avoid electric shock or short circuit, do not plug in or unplug quickly.
- To avoid electric shock, do not plug in or unplug with a wet hand.
- Do not expose Power Cords and 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 electric shock or short circuit.
- To avoid causing a fire or electric shock, do not put things on or damage Power Cords.
- When or after installing the product, do not unnecessarily pull the power cord. If damaged, the power cord can cause a fire or electric shock.
- In case the power cord is damaged, ask for replacement through where the product was purchased from or the office herein stated. Using the cord as is damaged can cause fire, electric shock or leakage.
- Be sure to perform grounding appropriately. Inappropriate grounding can cause an electric shock.
- Be sure to use fuses meeting specified rating. Using fuses exceeding the specified rating can cause a fire or electric shock.
- Completely make connector connections for IC BD and others. 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 physical conditions of the players or the lookers-on, or result in injury during play.
 - SEGA shall not be held responsible for damage, compensation for damage to a third party, caused by specification changes not designated by SEGA.
- Be sure to perform periodic maintenance inspections herein stated.



- For the IC board circuit inspections, only the logic tester is allowed. The use of a multiple-purpose tester is not permitted, so be careful in this regard.
- 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.
- Some parts are the ones designed and manufactured not 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.

● PRODUCTION DATE ●

This SEGA product was produced in the year of:

2004

This signifies that this work was disclosed in 2004.

2. PRECAUTIONS CONCERNING INSTALLATION LOCATION



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 a fire, electric shock, injury and or malfunctioning.

- Places subject to rain or 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.
- The operating (ambient) temperature range is from 5°C to 30°C.

LIMITATIONS OF USAGE REQUIREMENTS



- 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.
Non-compliance with the Electrical Specifications can cause a fire and electric shock.
- This product requires the Breaker and Earth Mechanisms as part of the location facilities. Using them in a manner not independent can cause a fire and electric shock.
- Ensure that the indoor wiring for the power supply is rated at 2.25 A or higher (AC single phase 100 ~ 120 V area). Non-compliance with the Electrical Specifications can cause a fire and electric shock.
- Be sure to independently use the power supply equipped with the Earth Leakage Breaker. Using a power supply without the Earth Leakage Breaker can cause an outbreak of fire when earth leakage 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 2.25 A or higher (AC 100 ~ 120 V area). Using a cord rated lower than the specified rating can cause a fire and electric shock.

Operation Area



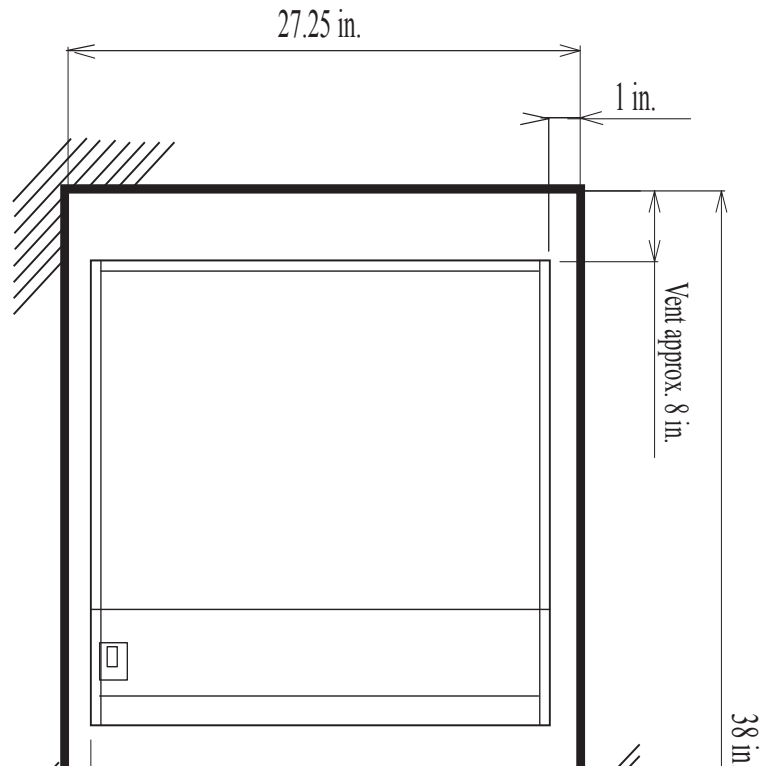
- For the operation of this machine, secure a minimum area of 27.25 in. (W) × 38 in. (D). In order to prevent injury resulting from the falling down accident during game play, be sure to secure the minimum area for operation.
- Be sure to provide sufficient space so as to allow this product's ventilation fan to function efficiently. To avoid machine malfunctioning and a fire, do not place any obstacles near the ventilation opening.
- SEGA shall not be held responsible for damage, compensation for damage to a third party, resulting from the failure to observe this instruction.



For transporting the machine into the location's building, the minimum necessary dimensions of the opening (of doors, etc.) are 26 in. (W) and 72 in. (H).

Electric current consumption

MAX. 2.25 A (AC 120 V 60 Hz)



3. OPERATION

PRECAUTIONS TO BE HEEDED BEFORE STARTING THE OPERATION

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



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.
- 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 may move and cause an accident.



Ensure that all of the Adjusters are in contact with the floor.



- 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.



- 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.
- To avoid electric shock, check to see if door & cover parts are damaged or omitted.
- To avoid electric shock, short circuit and or parts damage, do not put the following items on or in the periphery of the product.
Flower vases, flowerpots, cups, water tanks, cosmetics, and receptacles/containers/ vessels containing chemicals and water.

PRECAUTIONS TO BE HEHEDED DURING OPERATION (PAYING ATTENTION TO CUSTOMERS)

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



- To avoid injury and accidents, those who fall under the following categories are not allowed to play the game.
 - Those who have experienced muscle convulsion or loss of consciousness when playing video game, etc.
 - Intoxicated persons.
 - Persons whose act runs counter to the product's warning displays.
- To avoid injury resulting from falling down and electric shock due to spilled drinks, instruct the player not to place heavy items or drinks on the product.
- To avoid electric shock and short circuit, do not allow customers to put hands and fingers or extraneous matter in the openings of the product or small openings in or around the doors.
- To avoid falling down and injury resulting from falling down, immediately stop the customer's leaning against or climbing on the product, etc.



WARNING: HAZARD TO EPILEPTICS.

- A very small portion of the population has a condition which may cause them to experience epileptic seizures or have momentary loss of consciousness when viewing certain kinds of flashing lights or patterns that are present in our daily environment. These persons may experience seizures while watching some kinds of television pictures or playing certain video games. People who have not had any previous seizures may nonetheless have an undetected epileptic condition.
- If you or anyone in your family has experienced symptoms linked to an epileptic condition (e.g., seizures or loss of awareness), immediately consult your physician before using any video games.
- We recommend that parents observe their children while they play video games. If you or your child experience the following symptoms: dizziness, altered vision, eye or muscle twitching, involuntary movements, loss of awareness, disorientation, or convulsions, **DISCONTINUE USE IMMEDIATELY** and consult your physician.

4. ASSEMBLING AND INSTALLATION



- Perform assembly work by following the procedure herein stated. Failing to comply with the instructions can cause electric shock hazard.
- Perform assembling as per this manual. Since this is a complex machine, erroneous assembling can cause an electric shock, machine damage and or not functioning as per specified performance.
- When assembling, be sure to use more than one person. 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 accurately connected. Incomplete connections can cause electric shock hazard.
- Be careful not to damage the wires. Damaged wires may cause electric shock or short circuit or present a fire risk.
- This work should be performed by the Location's Maintenance Man or Serviceman. Performing work 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.
- 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's falling down, do not perform work in places where step-like grade differences, a ditch, or slope exist.



- Handle molded parts with care. Undue weight or pressure may cause them to break and the broken pieces may cause injury.
- To perform work safely and securely, be sure to prepare a step which is in a secure and stable condition. Performing work without using the step can cause violent falling down accidents.

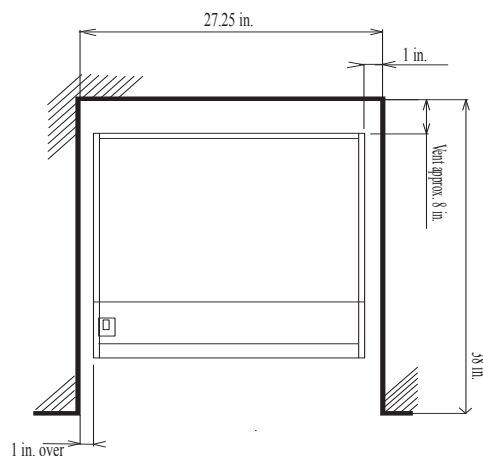


FIG. 6. 2 e
Provide ventilation space for the ventilation opening.
Allow more than 28 in. of space for customer traffic.



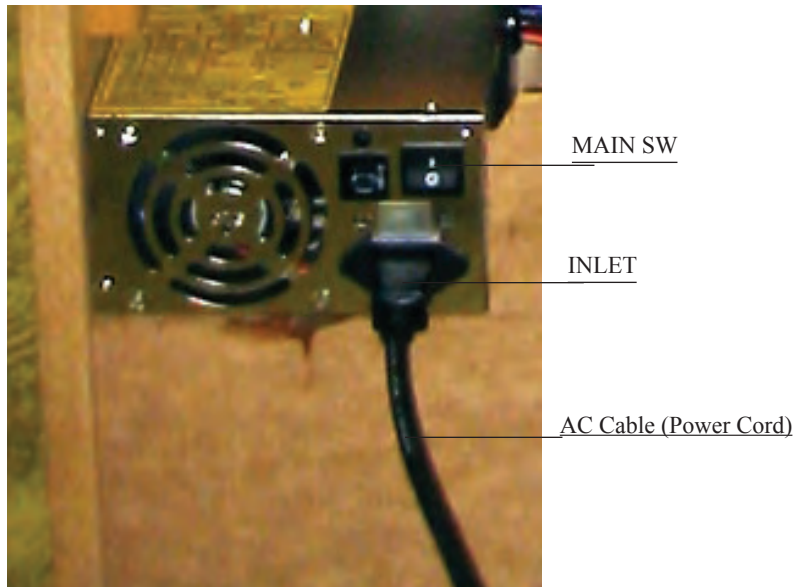
- Be sure to independently use the power supply socket outlet equipped with an Earth Leakage Breaker. Using a power supply without an Earth Leakage Breaker can cause a fire when electric leakage occurs.
- Ensure that the "accurately grounded indoor earth terminal" and the earth wire cable are available (except in the case where a power cord plug with earth is used). This product is equipped with the earth terminal. Connect the earth terminal and the indoor earth terminal with the prepared cable. If the grounding work is not performed appropriately, customers can be subjected to an electric shock, and the product's functioning may not be stable.
- Ensure that the power cord and earth wire are not exposed on the surface (passage, etc.). If exposed, they can be caught and are susceptible to damage. If damaged, the cord and wire can cause electric shock and short circuit accidents. Ensure that the wiring position is not in the customer's passage way or the wiring has protective covering.
- After wiring power cord on the floor, be sure to protect the power cord. Exposed power cord is susceptible to damage and causes an electric shock accident.

The AC Unit is located inside on one side of Cabinet. The AC Unit has Main SW and the Inlet which connects the Power Cord.

- Ensure that the Main SW is OFF.

Lower Back Left of Cabinet

Power is off when the MAIN SWitch is in the down position. To supply power to the unit, flip the MAIN SWitch upwards.



* Note: Actual Power Supply connection may vary from photo

5. PRECAUTIONS WHEN MOVING THE MACHINE



- When moving the machine, be sure to unplug the power plug. Moving the machine with the plug as is inserted can damage the power cord and cause fire and electric shock hazards.
- When moving the machine on the floor, pay careful attention so that adjusters do not tread power cords and earth wires. Damaging the power cords can cause electric shock and short circuit hazards.
- Do not push the cabinet from the left/right when attempting to move the unit. Pushing from the sides may cause the unit to tip and result in injury and damage to parts.



Do not push on any parts made of glass (e.g. Main Plex) or plastic, as these parts may break and result in bodily injury.



Do not push the cabinet from the left/right direction.

6. NAME OF PARTS



TABLE 4 Dimensions and Weights

	Width x Length x Height	Weight
Cabinet when assembled	25.25 in x 30 in x 71.5 in	315 LBS

7. GAME DESCRIPTION

The following explanations apply to a properly functioning game unit. Should there be any moves different from the following contents, a variety of possible faults may have occurred. Immediately look into the cause of the fault and eliminate the cause to ensure satisfactory operation.

When the power is turned on, the fluorescent lamp located in the marquee and the lamp below the instruction panel turn on. At this time, the conveyor belt begins to revolve and the Spongebob figure in the background rotates from left to right repeatedly. Also, the lamps at the top of the game will begin to rotate creating an underwater effect on the walls inside the cabinet. When the game enters the attract mode (roughly 40 seconds after powering up), sound will be heard through the speaker located above the Coin Door. When the game music starts, it indicates the game has initialized correctly and is ready to play.



Game Overview

This game is a redemption game. Coins/Tokens are used for play, and tickets are dispensed which are usually redeemed for prizes. The game has a revolving conveyor belt with various sized rectangular "Prize Area" boxes. By inserting a coin/token into the Coin Entry slot and landing it **within** one of the "Prize Areas", tickets will be dispensed. The amount of tickets depends on size and color of the "Prize Area" and the current game board settings.

8. HOW TO PLAY

- When a coin/token is inserted through the coin slot located on the face of the machine, it will travel down the coin chute to the plexi pineapple, then tumbles down to the face of the conveyor. At the time of coin insertion the speaker will start playing music.

Insert Coin



- After the coin/token exits the pineapple, the coin/token will land on the conveyor. A winning value depends on:
 - 1- Coin comes to rest in a “Prize Areas”
 - 2- Coin has no overhang past the “Prize Area”Red=4th(lowest)(largest)
Blue=3rd
Yellow=2nd
Green=1st(highest)(thinnist)



- Depending on the dip switch settings, if the coin is completely within the “Prize Area” a prize amount will be displayed in the treasure chest LED

Tickets Displayed



- REMEMBER: The goal is to land within the rectangle with no overhang.

Tickets Dispensed



9. Prize Settings Explained

Your Spongebob Squarepants game is shipped with 4 different prize plates. Each shows a different level of prize payout that corresponds with the dip switch settings #1 and #2.

- SW1 & SW2 -- Coins/Game * **Bold** denote default settings

- OFF - OFF = Payout Table 1- [3,5,1,25]



- * ON - OFF = Payout Table 2- [6,10,2,50] (Default Setting)



- OFF - ON = Payout Table 3- [12,15,3,25]



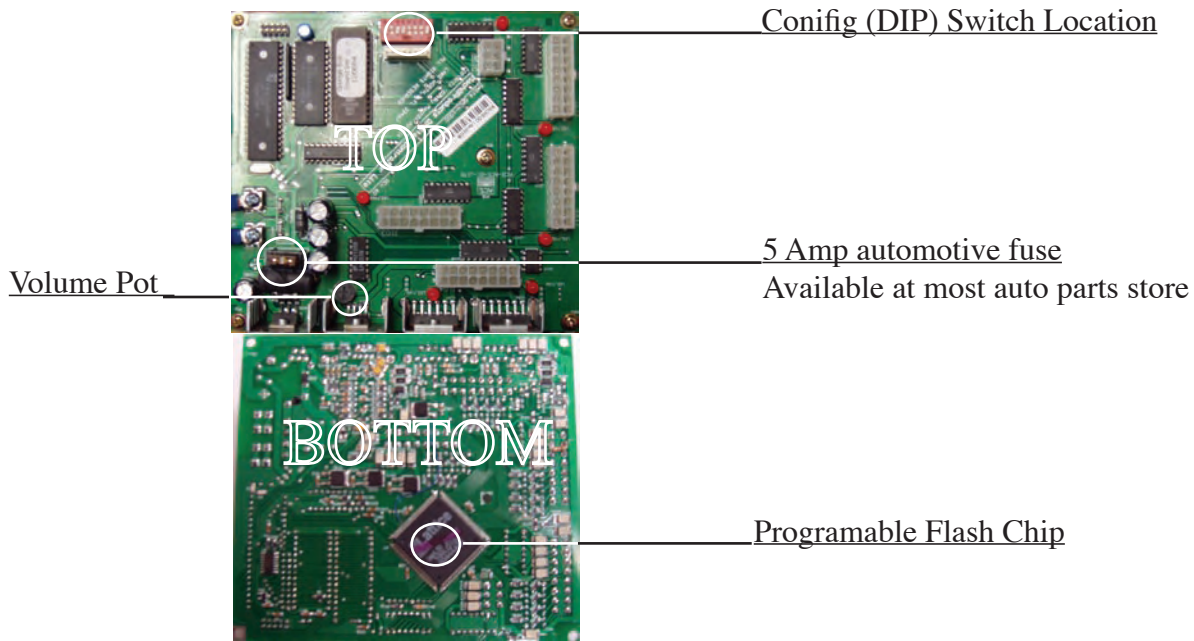
- ON - ON = Payout Table 4- [15,25,5,75]



10. Self Test Explained

Immediately after power is applied, the LEDs in the treasure chest will scroll around then display the checksum of the program.

11. Gameboard Config Settings

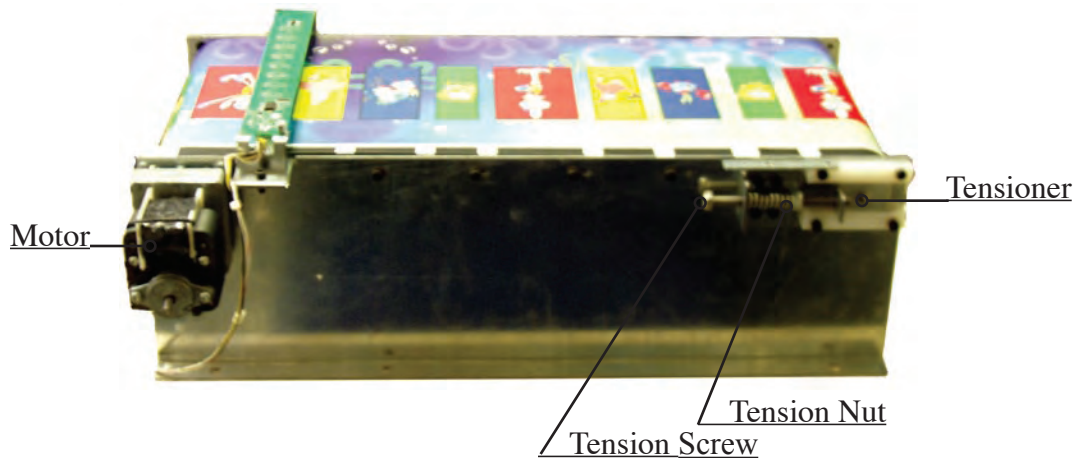


Spongebob Squarepants
Config Switch Settings for Production Models
software version: 1.04

Config Switch Settings: * **Bold** denote default settings

- SW1 & SW2 -- Coins/Game
 - OFF - OFF = Payout Table 1 [3,5,1,25]
 - * **ON - OFF = Payout Table 2 [6,10,2,50] (Default Setting)**
 - OFF - ON = Payout Table 3 [12,15,3,25]
 - ON - ON = Payout Table 4 [15,25,5,75]
- SW5 -- Mercy Ticket
 - * **ON = Enable Mercy Ticket (Default Setting)**
 - OFF = Disable Mercy Ticket
- SW6 -- Attract Mode
 - * **ON = Attract Enabled (Default setting)**
 - Off = Attract Disabled
- SW8 -- Prize/Ticket Version Setting
 - ON = Prize Version
 - * **OFF = Ticket Version (Default Setting)**

12. Conveyor Assembly



Adjusting Belt Tension

This conveyor has an Adjustor on both sides of the assembly which can be used to set the tension of the belt. Tension can be adjusted (2) ways using the tensioner.

- 1- Through tightening the Tension screw you will decrease tension on the roller to the belt.
- 2- Through tightening the Nut on the Bolt you will increase tension on the roller to the belt.

NOTE: The same amount of tension should be applied to both sides of the conveyor assembly to assure uniform belt wear.

Changing Conveyor Belt

- Decrease the belt tension as described above.
- Tear the old belt off along the seam in the belt. (Where it's taped together.)
- Wrap the new belt around the conveyor assembly. Remove the Backing to the double sided tape. Adhere the end of the belt to the double sided tape squarely.

NOTE: Replace worn belts immediately to keep optimum performance with your game unit.

13. COIN SELECTOR

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.

CLEANING THE COIN SELECTOR



- 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.

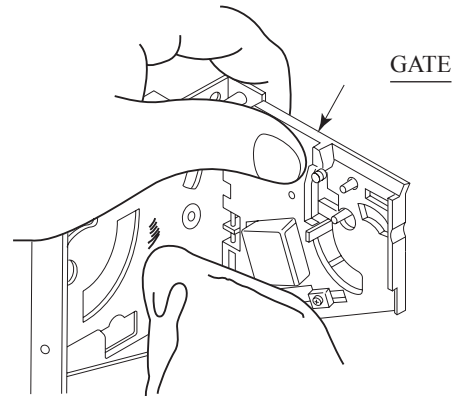


FIG. 11 a

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 (made of wool, etc.).
- (4) Remove and clean smears by using a soft cloth dipped in water or diluted chemical detergent and then squeezed dry.
- (5) Remove the CRADLE.
When removing the retaining ring (E ring), be very careful so as not to bend the rotary shaft.
- (6) Remove stain from the rotary shaft and shaft receiving portions by wiping off with a soft cloth, etc.
- (7) After wiping off as per (6) above, further apply a dry cloth, etc. to cause the coin selector to dry completely.

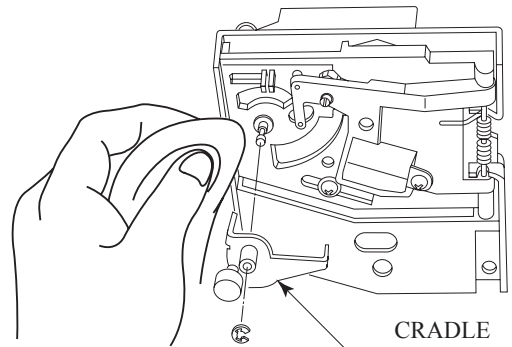


FIG. 11 b

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.

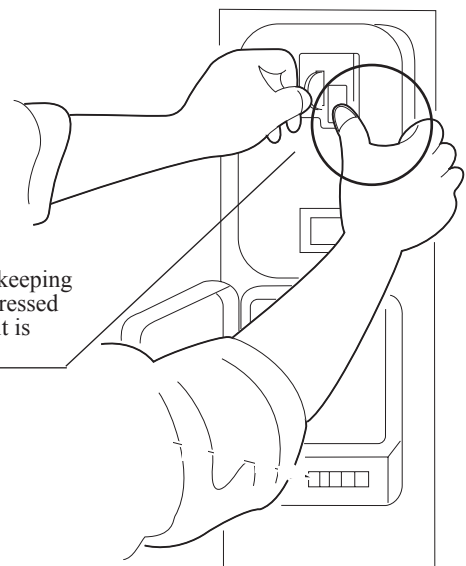


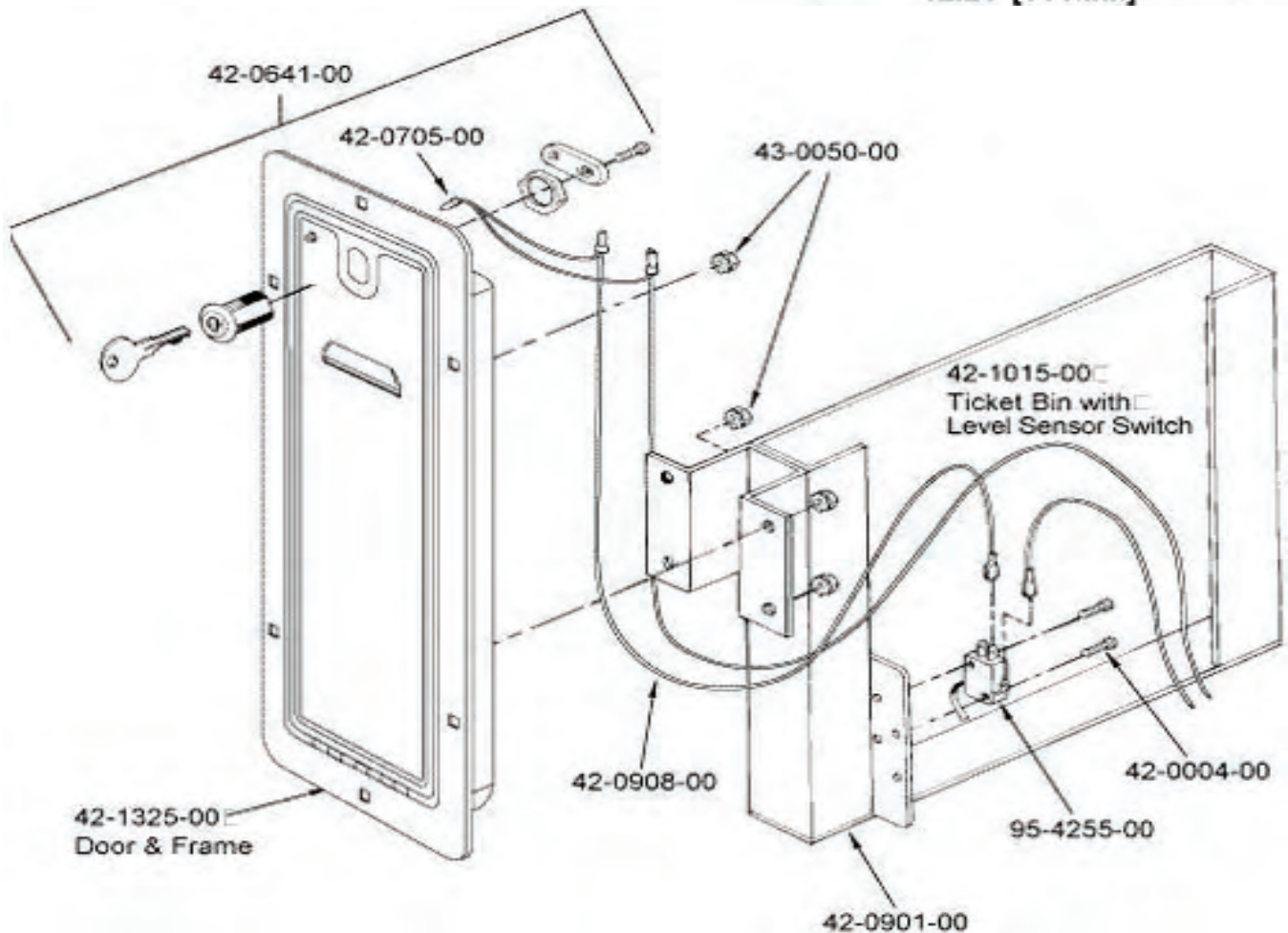
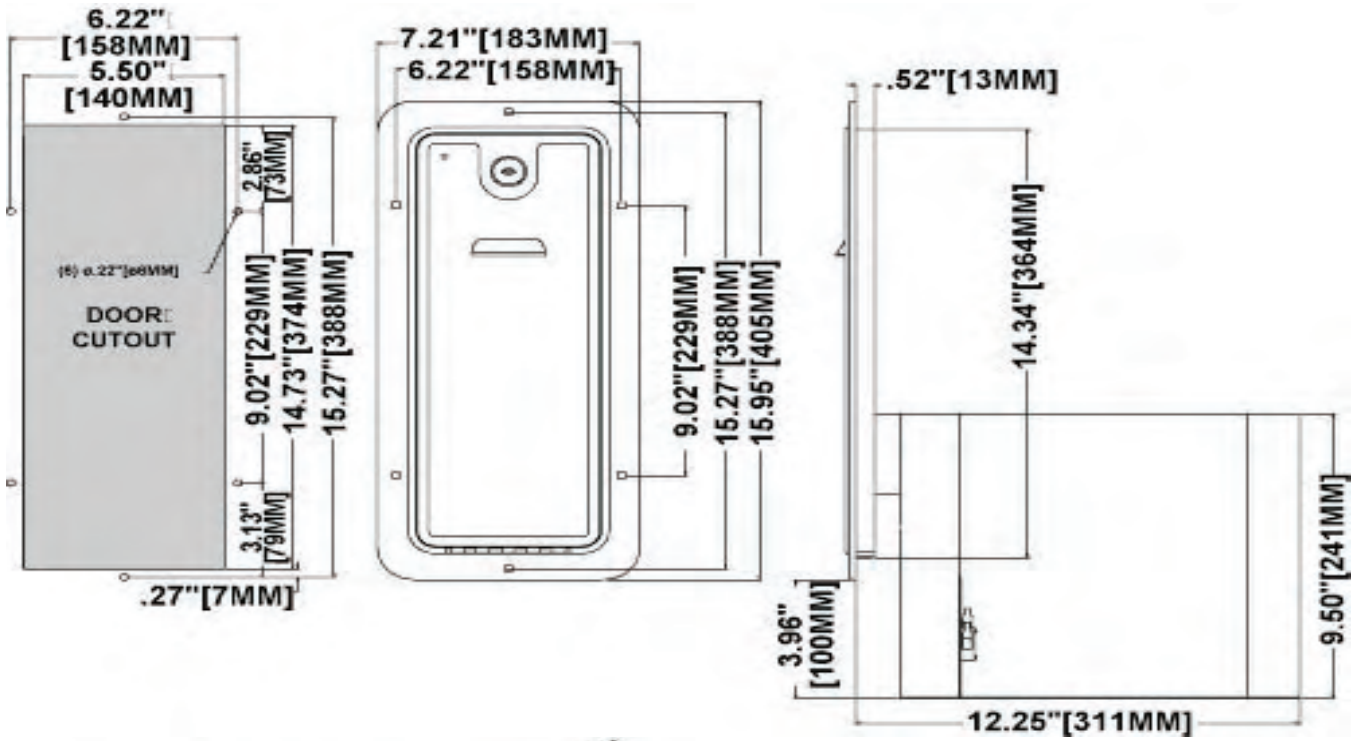
FIG. 11 c

Note: Actual Coin Chute does not appear as shown. Meter located inside of Ticket Door

14. TICKET DOOR

- Ticket Door is a Happ Controls Part #40-0550-00 and comes with the Ticket Stickers Happ Controls Part#42-1378-00 and Deltronics (DL-1275) Dispenser with Bin, LED, Level Sensor, & Harness. Door without Dispenser is Happ Controls Part # 40-0547-00.

- There is a ticket Meter in this game for an ongoing ticket count.

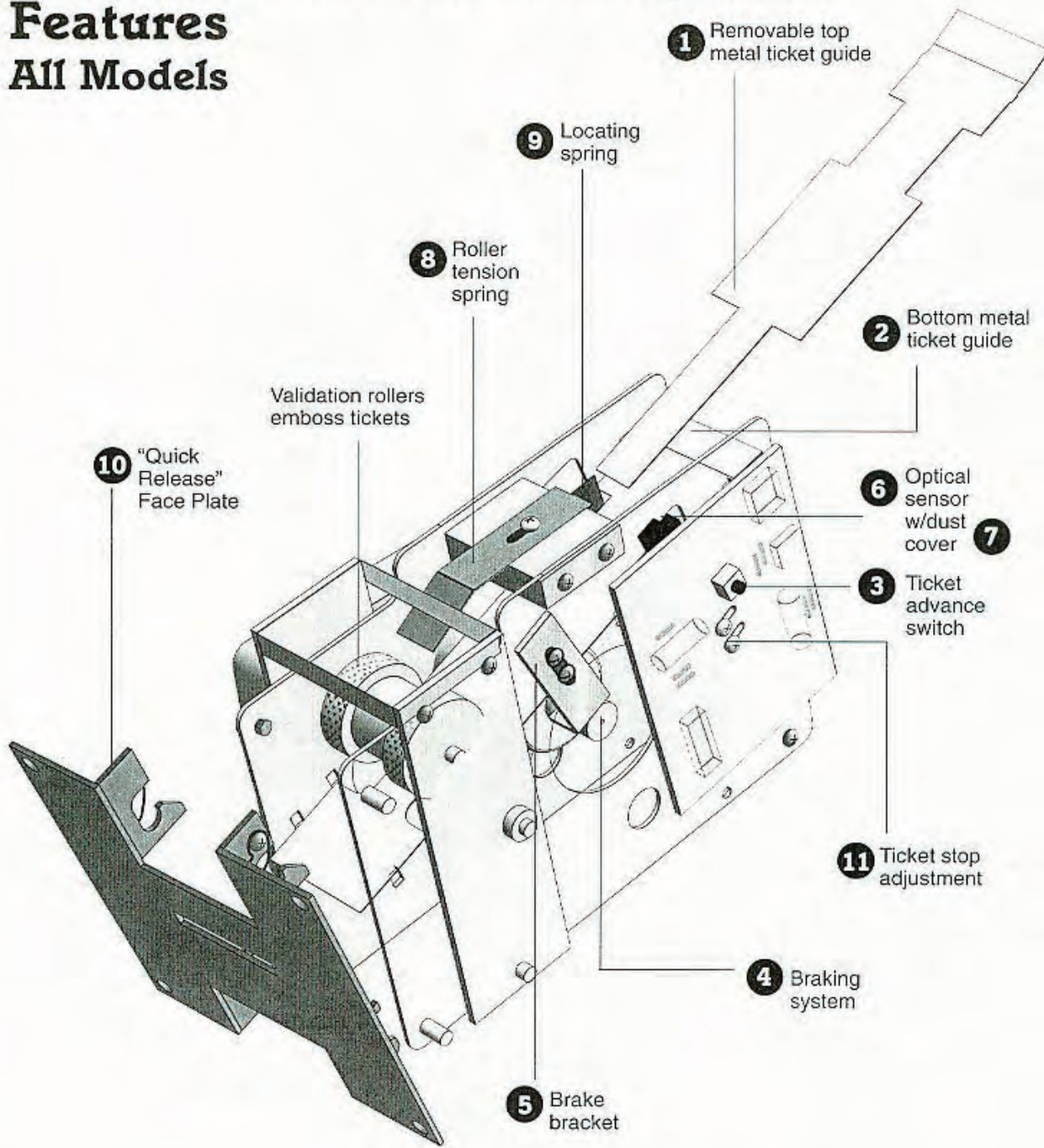


TICKET DISPENSER

“Quick Release” Ticket Dispenser

Features

All Models



- 1 Top Metal Ticket Guide**
For servicing, the top metal ticket guide can be removed and replaced. With unit facing you, gently spread side plates with thumb and index finger. Tilt guide to right at 45° angle and snap left side tab out and pull straight back. When replacing, simply reverse these steps. Note there is no need to spread side plates while replacing guide. Tilt to right and insert right tab first.

Note: When PCB has opto-sensor cover, guide is inserted over sensor then directed down to right. Be sure guide is **BELOW** brake bracket screws when replaced.

- 2 Bottom Metal Ticket Guide**
The longer, more durable ticket guide extends through the face plate allowing for better guidance plus a larger opening in the face plate prevents curled tickets from catching.

- 3 Loading of tickets with ticket advance switch**
Tickets are inserted in the rear of machine between the top and bottom ticket guides and pushed forward to the rollers. If needed, gently push the locating spring (9) away from the ticket guides. Then push the ticket advance switch until you see the edge of first ticket.

- 4 Braking system**
Our impressive new braking system eliminates brake slippage allowing foolproof, accurate dispensing. The new design also reduces wear and tear on the dispenser.

- 5 Brake bracket**
The brake is easily accessible and can be adjusted to engage immediately when ticket is pulled. (Minimum of 1/8" from brake wheel.)

- 6 Opto-Sensor**
Included as part of the controller is an opto-electronic beam sensor which detects the notch between tickets. The output of the ticket sensing circuitry is an open collector transistor.

- 7 Opto-Sensor Dust Cover**
In addition, an optical sensor dust cover is also included to eliminate the possibility of ticket dust accumulating on the optical sensor. This increases the accuracy of the ticket count and reduces maintenance.

- 8 Roller Tension Spring**
The roller tension springs keep constant tension on tickets which insures proper delivery and prevents the tickets from being "pulled through" when the dispenser is idle. To increase the tension, loosen the screw and move the spring forward. Tension is correctly adjusted when tickets cannot be pulled from the dispenser and validation rollers lightly emboss the tickets.

- 9 Locating Spring**
The ticket guide spring insures that the notches in the tickets pass through the opto-sensor. To decrease tension, loosen the screw and move the outer tension spring up. This changes the tension on the inner spring. The tickets should be snug between the spring and the side plate but not deformed by the excess tension. The spring is adjusted at the factory for 1-5/32" wide tickets and positioned 1/8" from ticket guides.

- 10 "Quick Release" Face Plate**
The dynamic new design allows the ticket dispenser to "quickly release" from its face plate on your cabinet or ticket door. This can be done manually and no tools are needed. This gives you complete access to the front of the rollers and to the ticket guides. Plus you can "snap out" one ticket dispenser and immediately replace it with another in just seconds.

- 11 Ticket Stop Adjustment**
The ticket stop adjustment allows you to position the tickets while the machine is off. The tickets should protrude through the slot at least 1/16". The ticket dispenser PC board is mounted on spacer with two screws with washers in two slotted holes. Loosening the screws and moving the board forward will allow the tickets to stop further out beyond the edge of the slot.

Dispenser Specifications

The quick release ticket dispenser greatly improves serviceability and reduces maintenance. Now standard on all Deltronic Labs Ticket Dispensers.

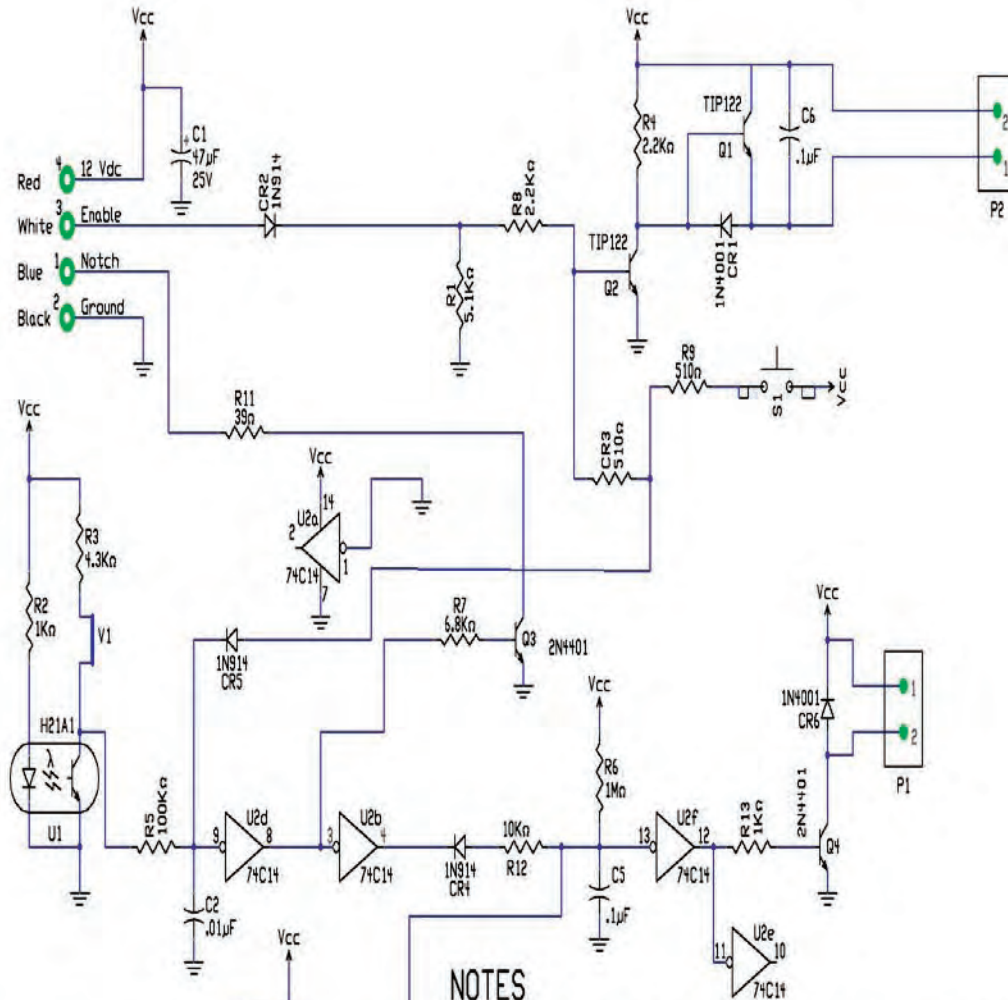
- Low voltage operations, only 12V DC
- Solid state output allows interfacing with electronic games
- Compact size, only 3-1/8" W x 4" H x 5-1/2" L
- Weight: 2-1/4 lbs.
- Validation "diamond" mark identifies tickets that have been dispensed.
- Adjustable ticket stop
- Dispenses 2"L x 1-5/32"W tickets
- One year warranty
- Standard face plate: 4"H x 3-3/4"W
- Narrow face plate: 4"H x 3-1/8"W

Control Board

Rev. 8

DL-1275 with 12V meter output

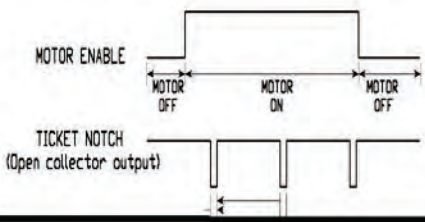
This dispenser is controlled by the game software. The game turns on the dispenser with a logic high signal and monitors a return notch signal from the ticket dispenser to turn it off. It will dispense as many tickets as games options allow.



NOTES

1. Resistor R9 and diode CR3 and the jumper going to pin 1 of the IC are changed for this revision. This was done to limit the current going thru the switch and then to pins 1 & 9 of the IC. This resolves problems that occurred with units that used unregulated power supplies. Deltronic Labs still recommends that regulated supplies be used. Changes closely reflecting these changes were made in the the previous revision (Rev. 7).
2. Resistors R10, R15, and R25 were deleted from this schematic. The Rev. 7 schematic shows these resistors, but they were never actually inserted on the board.
3. The unit as shipped from the factory (as per this schematic), will trigger the counter whenever tickets are dispensed normally, but NOT when doing so by pressing the switch. If desired, the unit can be changed so that tickets dispensed by pressing the switch are also counted. Do this by deleting diode CR5.
4. This unit can be made to conform to CE specifications by the addition of 4 components not shown here. If this is desired, please order the CE version, and the unit will be shipped with the necessary components.
5. This unit can be configured in a number of ways. Please check our "Full Options" schematic to see the different configurations. If this schematic is not included with your manual, contact us for a copy.
6. If tickets are highly translucent, the 4.3Kohm resistor (R3) can be lowered in value (e.g. 2.2 Kohm). For more sensitive adjustment, the jumper V1 can be replaced with a 25K pot, and the 4.3 Kohm resistor (R3) changed to 1Kohm.

	MIN.	TYP.	MAX.
MOTOR SUPPLY - V --	11 V	12 V	13 V
I (START) ----	1.3 A	1.5 A	1.7 A
I (RUN) -----	-----	.4A	.85 A
I (STANDBY) --	-----	-----	30 MA
MOTOR ENABLE ON - V --	2.5 V	-----	12 V
I --	250 uA	-----	2.5 MA
MOTOR ENABLE OFF - V --	-----	-----	1.0 V
I --	-----	-----	0 MA
TICKET NOTCH - I SINK --	-----	-----	50 MA
V PULL UP --	-----	-----	30 V



Ticket Dispenser Assembly

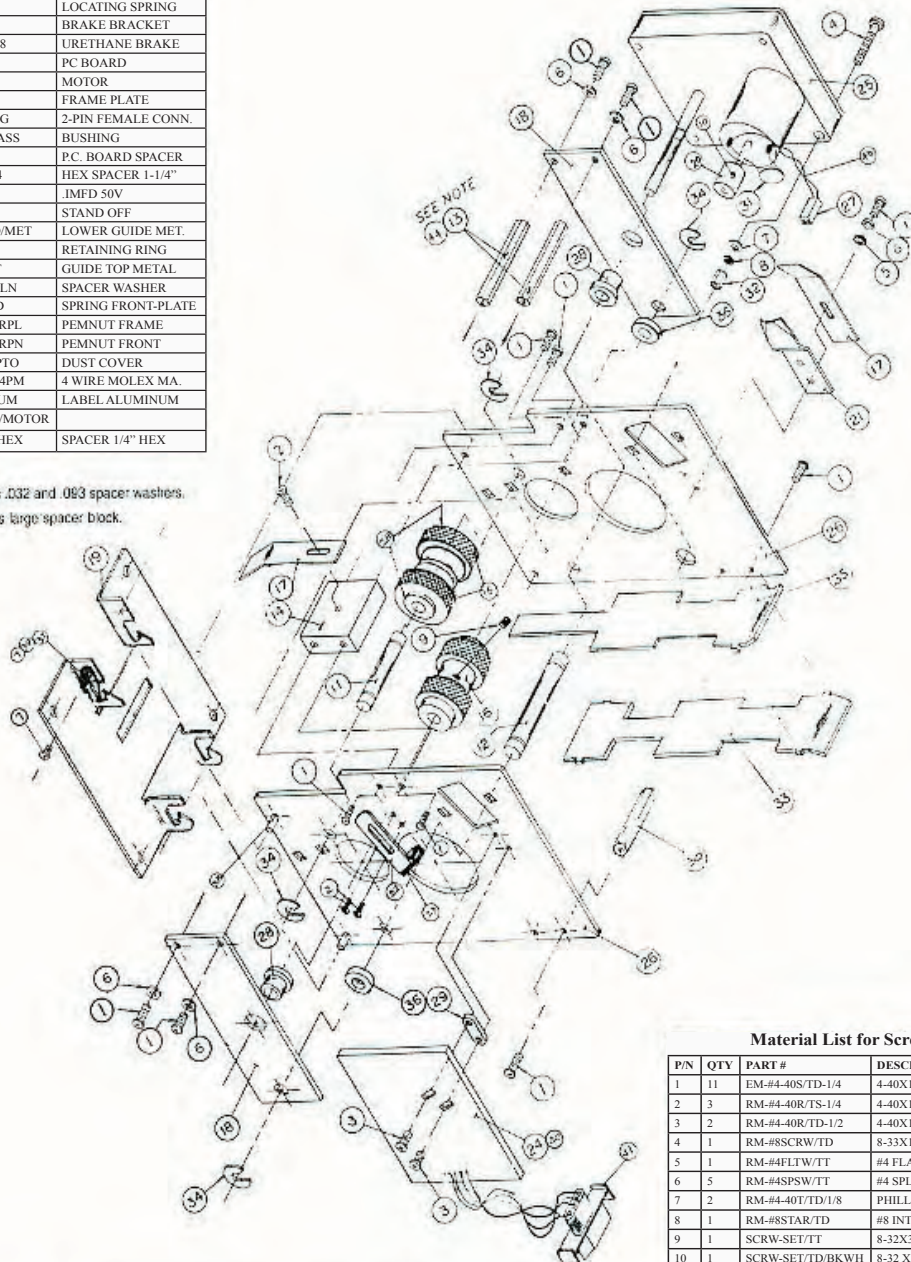
DETAILS OF PARTS

P/N	QTY	DELTRONIC LABS P/N	NAME
11	1	SHFT-IDLRLR/TD	IDL. ROLLER SHAFT
12	1	RM-SFTMTR/TD	MOTOR PIVOT SHAFT
13	1	SPAC PIVBLK/TD/4HOL	PIVOT BRACKET SPAC
14	1	RM-SPCPB/TD	SPACER BLOCK
15	2	RM-RIRIDL/TD/VALD	IDLER ROLLER
16	1	RM-RLRDRV/TD/VALD	DRIVER ROLLER
17	2	SPRG-TENSN/TD	TENSION SPRING
18	2	RM-BKTPVT/TD	BRAKE WHEEL
19	1	RM-PANLFT/TD/NOPM	FRONT PANEL
20	1	RM-WHLBRK/TD	BRAKE WHEEL
21	1	SPR-LOCA/TD	LOCATING SPRING
22	1	RM-BRKTBRK/TD	BRAKE BRACKET
23	1	RM-BKTTUB/TD/3/8	URETHANE BRAKE
24	1	PCBD-12275/TD	PC BOARD
25	1	RM-MOTOR/TD	MOTOR
26	2	RM-PLATFR/TD	FRAME PLATE
27	1	RM-CONN2P/TE/20G	2-PIN FEMALE CONN.
28	4	BRNG-F312/TT/BRASS	BUSHING
29	1	SPAC-PCBD/TD	P.C. BOARD SPACER
30	1	SPAC/HEX/TD/1-1/4	HEX SPACER 1-1/4"
31	1	RM.1M/TT/50V	JMFD 50V
32	1	SPAC-HEX/TD/1/4"	STAND OFF
33	1	GUID-BOTTOM/TD/MET	LOWER GUIDE MET.
34	4	RING-E25RT/TT	RETAINING RING
35	1	GUID-TOP/TD/MET	GUIDE TOP METAL
36	2	PULY-SP212/TE/NYLN	SPACER WASHER
37	2	SPRG-FRONTTP/TD	SPRING FRONT-PLATE
38	4	RM-PEMNUT/TD/FRPL	PEMNUT FRAME
39	2	RM-PEMNUT/TD/FRPN	PEMNUT FRONT
40	1	COVR-H21A/TD/OPTO	DUST COVER
41	1	CONN MOLEX/TD/4PM	4 WIRE MOLEX MA.
42	1	RM-LABEL/TD/ALUM	LABEL ALUMINUM
43		WIRE-REDBLK/TD/MOTOR	
44	2	SPAC-PIVBRK/TD/HEX	SPACER 1/4" HEX

* Order by Model #

** Note: F/N #36 replaces .032 and .093 spacer washers.

*** Note: F/N #44 replaces large spacer block.



Material List for Screws

P/N	QTY	PART #	DESCRIPTION
1	11	EM-#4-40S/TD-1/4	4-40X1/4"SCREW
2	3	RM-#4-40R/TS-1/4	4-40X1/4"WASHER HEAD
3	2	RM-#4-40R/TD-1/2	4-40X1/2"WASHER HEAD
4	1	RM-#8SCRW/TD	8-33X1-1/4"
5	1	RM-#4FLTW/TT	#4 FLAT WASHER
6	5	RM-#4SPSW/TT	#4 SPLIT LOC. WASHER
7	2	RM-#4-40T/TD/1/8	PHILLIPS TRUSSHEAD
8	1	RM-#8STAR/TD	#8 INT STAR WASHER
9	1	SCRW-SET/TT	8-32X3/16" SET SCREW
10	1	SCRW-SET/TD/BKWH	8-32 X 1/8 SET SCREW

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15. TROUBLESHOOTING AND BELT SYSTEM INFORMATION

15-1 TROUBLESHOOTING



- In order to prevent electric shock and short circuit, be sure to turn power off before performing work.
- Be careful not to damage the wires. Damaged wires may 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 on 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.

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

TABLE 15. 1

PROBLEM	CAUSE	COUNTERMEASURES
When the main SW is turned ON, the machine is not activated.	The power is not ON.	Firmly insert the plug into the outlet.
	Incorrect power source/voltage.	Make sure that the power supply/voltage are correct.
	The CIRCUIT PROTECTOR functioned due to momentary overcurrent.	After eliminating the cause of overload, have the Circuit Protector of the AC Unit restored.
Sound is not emitted from the speakers or woofers.	Sound volume adjustment is not correct.	Adjust the Switch Unit's sound adjustment volume.

CIRCUIT PROTECTOR

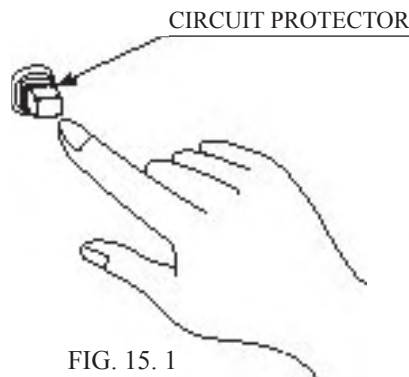


FIG. 15. 1

Functions due to the activation of bimetal. To restore the function, wait for approximately one minute or longer until the bimetal cools off. (Press the Button.)

15-2 BELT SYSTEM INFORMATION AND TROUBLESHOOTING

Belt System Information

The SpongeBob game uses opto-sensors to read the coins that land on the belt during game play. The Belt is covered with characters and corresponding index marks on the belt's edge.

The way a prize is awarded is to have a coin read 'After' the index mark for that area is read and "Before" the end of the same index area is detected.

To accomplish this, we use an Opto Board that uses reflective opto sensors which read each coin as it passes under the Opto Board, and the Belt Reader Opto on the same board reads the index marks on the belt's edge.

Troubleshooting the Belt System

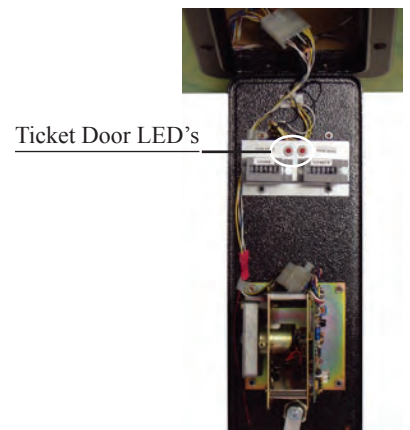
There are two (2) different areas in the SpongeBob Game that will allow the technician to check the working condition of the belt opto-reader system.

1- **Ticket Door LEDs:** there are two (2) separate LED's that are located inside the Ticket Door. They are marked 'Coin Opto' and 'Edge Opto' (See Photo 15.1)

- **The Coin Opto** will illuminate every time ANY of the 4 Optos on the coin reader board detects a coin passing under it. This indication is a multiplexed output, and will not indicate which of the four (4) coin optos have been activated

- **The Edge Opto** will illuminate every time it reads a white colored space on the edge or "index" of the belt. This is how the system knows which square was landed on when a coin is read.

NOTE: there is one 'Home' position on the belt. You can observe this on the belt when the 'Edge Opto' LED flashes two (2) times rapidly as the belt's "Home" position goes by.



Ticket Door LED's

Photo 15. 1

2- **Coin Reader Board LEDs:** There are additional LEDs under the metal cover on the Coin Reader Board (See Photo 15.2). There is one (1) LED for each of the Coin Sensors and one (1) LED for the Edge Opto. By removing the cover, you can see each individual opto work rather than seeing the multiplexed output in the 'Coin Opto' LED in the Ticket Door. This allows you to isolate a single malfunctioning opto.

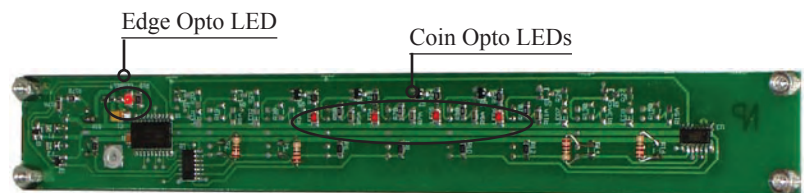


Photo 15. 2

PROBLEM	CAUSE	COUNTERMEASURES
Incorrect Prizes awarded when a player land in a square.	Incorrect dip switch settings	Assure the Settings Match the Prize card displayed
	Worn out belt	Assure that the index marks are being read by the Edge Opto and the belt is in good condition. Replace Belt.
Coins are not read on the belt.	Improper initialization from coin insertion.	Be sure machine is properly initialized before inserting coins. Cycle Power on unit and wait 45 seconds for belt to make two (2) rotations. Wait for game sounds to begin.
	Opto malfunction. Improper coin placement.	Assure coin is COMPLETELY within prize square. Assure coin opto is flashing as coin passes underneath. Repair as necessary.
	Opto distance from belt wrong.	Check for spacer underneath Opto Board. If spacer exists then remove. If there is no spacer, then perhaps a spacer is needed to set proper distance. Add spacer.

16. DESIGN RELATED PARTS



999-2261 SBR Decal Marquee

999-2264 SBR Diecut Figure SB

999-2136 SBR Decal L Side

999-2137 SBR Decal R Side

999-2144 SSR Pineapple Assy.

999-2138 SBR Decal Front



999-2141 SBR Decal Middle Inside

999-2142 SBR Decal Inside R

999-2159 SBR Decal
Conveyor Bezel

999-2263 Decal SBR
Opto Cover

999-2140 SBR Decal
Inside L

999-2155 SBR
Conveyor Belt

- 999-2145 Instruction 1
- 999-2146 Instruction 2
- 999-2147 Instruction 3
- 999-2148 Instruction 4

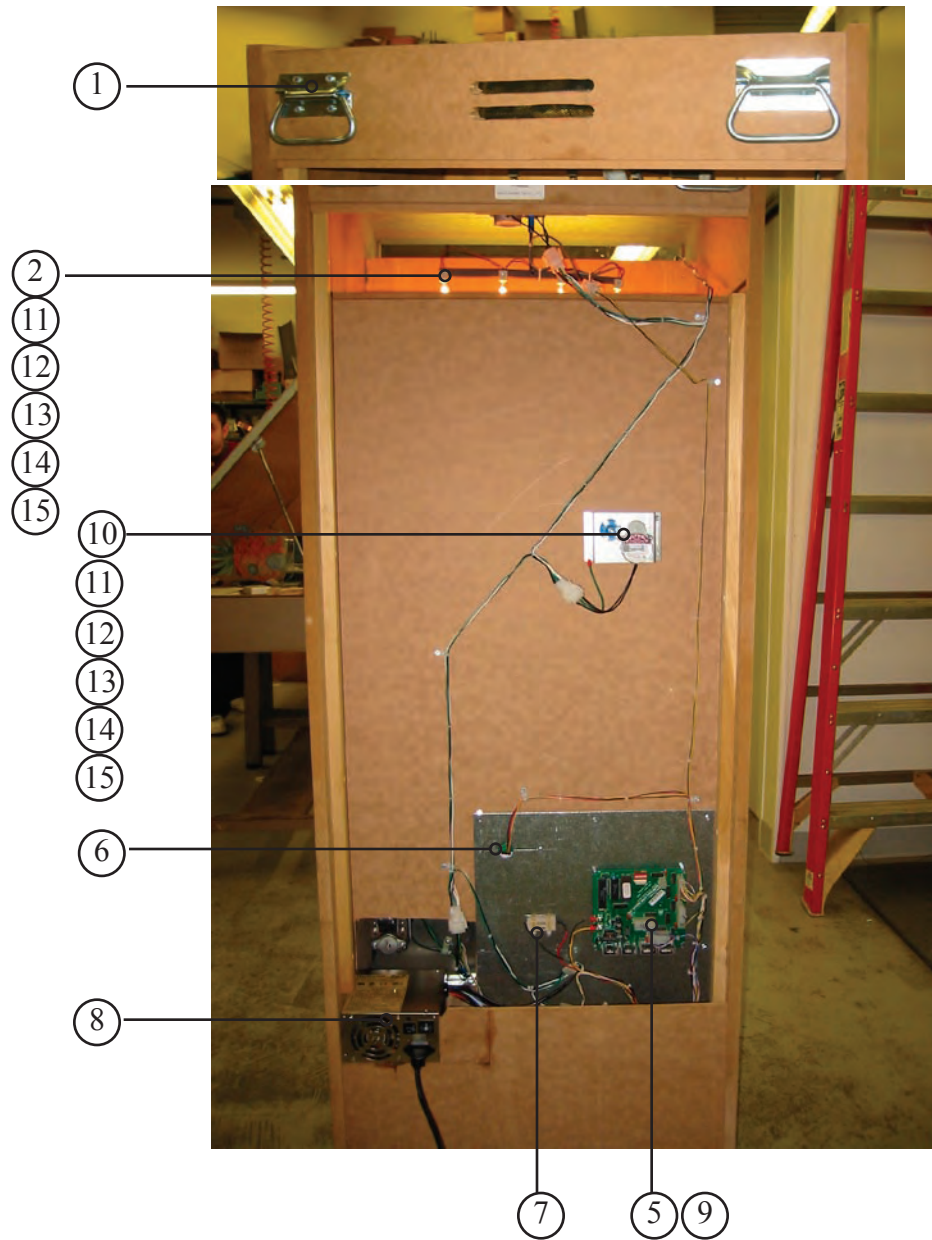
17. PARTS

Outer Game Area



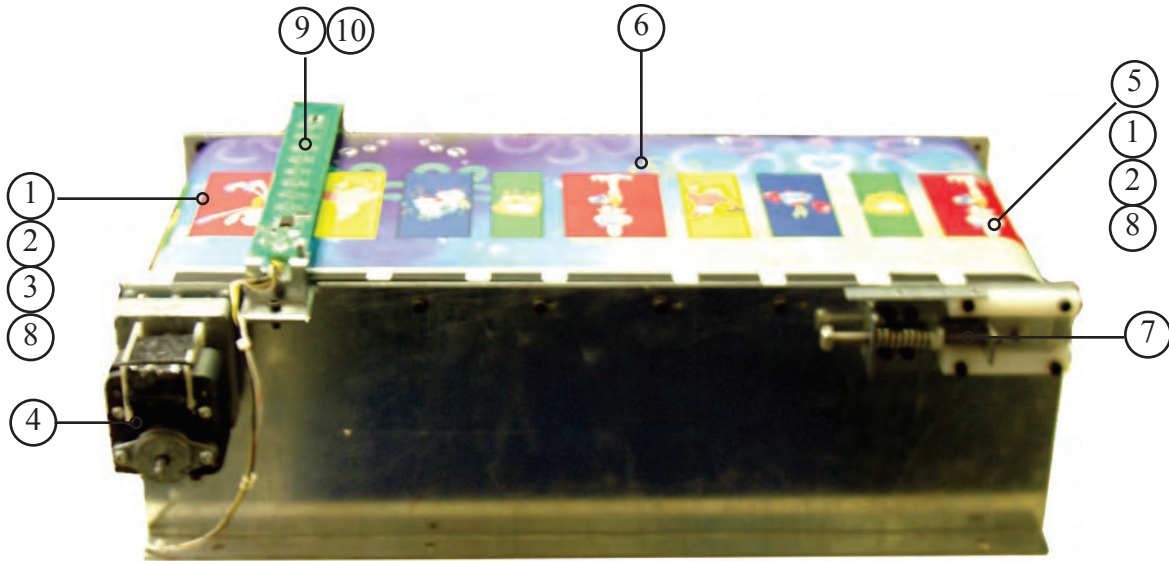
ITEM NO.	PART NO.	DESCRIPTION	NOTE
1	999-2262	Front Plex	
5	998-0225	Coin Mech & Face Plate	Happ#830-4061-07
6	999-2133	Coin Door Lock	
7	999-2151	Ticket Door Assembly	Happ#40-0550-00
8	999-2271	Ticket Dispenser	
9	999-2170	Cash Box Door	Happ#40-0057-00
10	999-2171	Cash Box	Happ#42-1102-10
11	999-2187	Cash Box Lock	
12	999-2163	Coin Mech Box	
13	999-2162	Porthole Plex	
14	999-2160	Porthole Ring	
15	999-2154	Cabinet Casters	
16	999-2272	Cabinet Leg Levelers	
17	999-2273	Bottom Plex Retainer	
18	999-2165	Lock Ticket Door	
19	999-2153	Coin/Ticket Meters	
20	999-2274	Coin/Ticket Meters Bracket	
21	999-2182	Coin Mech Door	

Rear Game Area



ITEM NO.	PART NO.	DESCRIPTION	NOTE
1	999=2275	Rear Handles	HAPP
2	998-0224	Assy Oscillating Light	
5	998-0221	PCBoard MPU	
6	998-0223	3 Digit LED Display	
7	998-0228	5V Dummy Load	
8	998-0220	Power Supply	
9	999-2157	PCB Bracket	
10	999-2276	Motor Mounting Bracket	
11	999-2284	Motor, 9RMPM 120VAC	
12	999-2277	Flipper Bushing	
13	999-2278	Motor Hub	
14	999-2279	Motor Link	
15	999-2280	Motor Shaft	

Conveyor Assy 999-2149



ITEM NO.	PART NO.	DESCRIPTION	NOTE
1	999-2281	Bracket Roller	
2	999-2282	Roller Pin	
3	999-2283	Drive Roller	
4	999-2285	Motor, 20RPM 120V CW	
5	999-2286	Idler Roller	
6	999-2155	Belt Screened	
7	999-2287	Bracket Spring Support	
8	999-2288	Spring Roller	
9	999-2289	Mounting Bracket Opto Board	
10	998-0222	P.C. Board Opto	

Play Area



ITEM NO.	PART NO.	DESCRIPTION	NOTE
1	999-2290	Opto Board Cover	
2	999-2291	Prize Card Bracket	
3	999-2292	Fluorescent Plex Separator	
4	999-2159	Conveyor Bezel	

Misc Parts Not Shown

ITEM NO.	PART NO.	DESCRIPTION	NOTE
1	999-2132	Lock Rear Door	
2	999-2293	Sponge Bob Mounting Block	
3	999-2161	Light Defuser	
4	999-2158	Coin Chute Assy	
5	999-2294	Cash Box Coin Chute	
6	999-2295	Fluorescent Lamp Holder	
7	Local Purchase	Bulb 15W 18" CoolWhite	
8	999-2150	Assy Pineapple	
9	999-2164	Speaker	
10	999-2296	Vent Grill	



18. WIRE COLOR CODE TABLE

THE WIRE COLOR CODE is as follows:

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

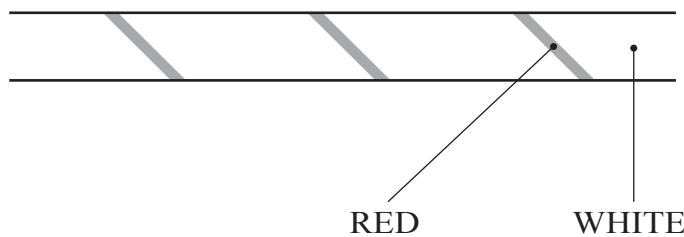
Wires other than the above 5 single colors will be displayed by 2 alphanumeric characters.

- 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 alphanumeric 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 shows the spiral color.

<Example> 51 WHITE / RED



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

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

Warranty

Your new Sega Product is covered for a period of 90 days from the date of shipment. This certifies that the Printed Circuit Boards, Power Supplies and Monitor are to be free of defects in workmanship or materials under normal operating conditions. This also certifies that all Interactive Control Assemblies are to be free from defects in workmanship and materials under normal operating conditions. No other product in this machine is hereby covered.

Sellers sole liability in the event a warranted part described above fails shall be, at its option, to replace or repair the defective part during the warranty period. For Warranty claims, contact your Sega Distributor.

Should the Seller determine, by inspection that the product was caused by Accident, Misuse, Neglect, Alteration, Improper Repair, Installation or Testing, the warranty offered will be null and void.

Under no circumstances is the Seller responsible for any loss of profits, loss of use, or other damages.

This shall be the exclusive written Warranty of the original purchaser expressed in lieu of all other warranties expressed or implied. Under no circumstance shall it extend beyond the period of time listed above.



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