

DOCUMENT: HMS_SSC_DIAG.TXT UPDATED 10/3/2020
HMS_SSC Slot Controller Board Diagnostics

To enable machine diagnostics move 'finger pull jumper' J5 to the 'Diag' position (return the jumper to 'Run') The machine will display -01 on the coin out meter

Note: If you do not see -01 on the coins paid meter (3 digit meter show coins paid) Goto the 'Meter Diagnostics' below

;GAME DIAGNOSTICS (TESTS ALL INPUTS/OUTPUTS OF THE GAME)
;USE HOPPER FILL TO STEP THRU THESE DIAGNOSTICS (-01 thru -17 or -21 for Ver 2.0 firmware)

GAME_DIAGNOSTIC

-01 TURN ON COIN_LI_1 + INCL (INSERT COIN LIGHT)
-02 TURN ON COIN_LI_2 + CACL (COIN ACCEPTED LIGHT)
-03 TURN ON COIN_LI_3 + TILT (TILT LIGHT)
-04 TURN ON COIN_LI_4 (NOT ON ALL MACHINES)
-05 TURN ON COIN_LI_5 (NOT ON ALL MACHINES)
-06 TURN ON COIN_LI_6 (NOT ON ALL MACHINES)
-07 DISPLAY COIN IN SWITCH (COIN LIGHTS 1 THRU 3 TURN ON WITH SWITCH CLOSURE)
-08 DISPLAY COIN OUT SWITCH (COIN LIGHTS 1 THRU 3 TURN ON WHEN ACTIVATING THE COIN OUT SWITCH ON THE HOPPER)
-09 DISPLAY DOOR SW (COIN LIGHTS 1 THRU 3 TURN ON WITH DOOR OPEN AND SHOULD TURN OFF WITH DOOR CLOSED (HINGE SWITCH))

USE THE HOPPER RESET SWITCH TO ACTIVATE THE FOLLOWING DIAGNOSTICS:

-10 CLKT (COIN LOCKOUT COIL (BEHIND THE COIN MECHANISM))
-11 RUN THE JPBL (JACK POT BELL)
-12 TEST THE HPSF CIRCUIT (THE HOPPER SHOULD NOT RUN)
HPSF = HOPPER SAFE CIRCUIT
-13 TEST THE HPRN CIRCUIT (THE HOPPER SHOULD NOT RUN)
HPRN = HOPPER RUN CIRCUIT
-14 RUN THE HOPPER (RUNS BOTH HPSF AND HPRN)
(BOTH HPSF AND HPRN ENABLE THE HOPPER TO RUN)
-15 RELEASE THE HANDLE (THE HANDLE RELEASE COIL IS ACTIVATED)
(THE RELEASE LEVER SHOULD DROP ALLOWING THE HANDLE TO BE PULLED)
-16 SHOW 'LAUNCH SWITCH' STATE (PRESS HOPPER RESET TO RELEASE THE HANDLE)

COIN LIGHT1 1 IS ON, LIGHT 3 IS OFF (REELS NOT LAUNCHED)
LIGHT 1 GOES OFF AND LIGHT 3 GOES ON AS THE REELS ARE LAUNCHED (THE LAUNCH SWITCH RETURNS TO THE STANDBY STATE AFTER REELS ARE LAUNCHED)

FIRMWARE 1.0

-17 GAME SIMULATION (REELS 1-3 OR REELS 1-4) (Press Hopper Reset to release the handle)

PULL THE HANDLE, LAUNCH THE REELS, REELS STOPPED (EACH REEL RUNS .4 SECONDS WITHOUT TRACKING)

FIRMWARE 2.0 (REELS CAN BE LAUNCHED TO CHECK THE STOP LEVERS)

- 17 PULSE REEL1 SOLENOID WITH PRESS OF HOPPER RESET
- 18 PULSE REEL2 FIRMWARE WITH PRESS OF HOPPER RESET
- 19 PULSE REEL3 SOLENOID WITH PRESS OF HOPPER RESET
- 20 PULSE REEL4 SOLENOIDE WITH PRESS OF HOPPER RESET
- 21 GAME SIMULATION (SAME AS 1.0 STEP 17)

Note: You can press 'Master Reset' to exit diagnostics.

'COINS PAID METER' DIAGNOSTIC:

MOVE THE FINGER PULL JUMPER 'J4' TO THE 'DIAG' POSITION.
THE COINS PAID METER SHOULD CYCLE THRU DIGITS 1-9 PLUS SOME
SPECIAL SEGMENTS.

IF THE YOU DO NOT GET ALL 3 DIGITS OR ALL 7 SEGEMENTS THEN THE 18
AND 24 PIN CONNECTORS AT THE BACK OF THE REEL ASSEMBLY NEED
CLEANING.

RE: CLEANING:

IF YOU HAVE A DREMEL TOOL AND A SOFT 'BRASS' WIRE BRUSH, USE THAT
TO CLEAN THE OXIDATION OFF THE PINS. Then spray
contact cleaner into the female connectors. Insert the reel
assembly multiple times to help 'wipe' the oxidation off of
the female recepticle once the contact cleaner has been applied.

No Dremel tool: You can use some very fine sand paper (600 grit)
and a popsicle stick to gently clean the pins.

Note: If you remove the tin plating exposing the brass metal of
the pin, then you will likely need to replace the
connectors. The original connectors were custom connectors. The
replacement connectors (same manufacturer) have to be
replaced in pairs (both 24 pin or both 18 pin connectors). This
is very tedious and not recommended!

Note: If all segments/digits don't work, the try shifting the
reel assembly left to right or slightly in/out. If the
digits/segments start working, then the connector pins are still
a problem

2.0 FIRMWARE IMPROVEMENTS

The Master Reset now will cause a 'Power ON' condition for the
board.

Game codes are now in place that allow 'resume of play' according
to the game state when power is turned off.

I.E. if coins were in then the coins are saved and play is
resumed with the number of coins that were in.

Master Reset: The Master Reset Switch (the same as powering down)
saves the state of the game. The state of the game is then
restored when power is turned back on.

Game Reset: To 'Reset the Game' (no coins in, no play in progress) Press and hold the hopper reset switch then press the Master Reset Switch. The game code will be erased so that the machine powers up with -0- (no game in progress).

Note: With the additions of the game codes, the machine will power up with the 'last coins paid' in the coin meter.