

Table 3. Solenoid Connections

SOL. NO.	FUNCTION	WIRE COLOR	CONNECTIONS	DRIVER TRANS.	SOLENOID PART NO.
01	Ball Release	GRY-BRN	2P11-4, 8P3-17	Q15	SA-31850-DC
02	"1-3" Drop Targets Reset	GRY-RED	2P11-5, 8P3-18	Q17	SA-31850-DC
03	"4-6" Drop Targets Reset	GRY-ORN	2P11-8, 8P3-19	Q19	SA-31850-DC
04	Left Eject Hole	GRY-YEL	2P11-8, 8P3-20	Q21	SG-23480-DC
05	Right Eject Hole	GRY-GRN	2P11-9, 8P3-21	Q23	SG-23480-DC
06	Upper Right Eject Hole	GRY-BLU	2P11-3, 8P3-22	Q25	SG-23480-DC
07	Left Ball Saver Kicker	GRY-VIO	2P11-2, 8P3-23	Q27	SG-23480-DC
08	Ball Ramp Thrower	GRY-BLK	2P11-1, 8P3-24	Q29	SA-23480-DC
09	Sound	BRN-BLK	2P9-6, 10P3-3	Q31	--
10	Sound	BRN-RED	2P9-7, 10P3-2	Q33	--
11	Sound	BRN-ORN	2P9-1, 10P3-5	Q35	--
12	Sound	BRN-GRN	2P9-2, 10P3-4	Q37	--
13	Sound	BRN-YEL	2P9-3, 10P3-7	Q39	--
14	Credit Knocker	BRN-BLU	2P9-4, 7P1-16	Q41	SA2-23480-DC
15	Flash Lamps	BRN-VIO	2P9-5, 6P2	Q43	Type B9 Bulbs
16	Coin Lockout	BRN-GRY	2P9-6, 7P1-18, 7P2-4	Q45	SM-354000-DC
17	Top Left Jet Bumper	BLU-BRN	2P12-7, 8P3-11	Q2	SG-23480-DC
18	Bottom Left Jet Bumper	BLU-RED	2P12-4, 8P3-12	Q4	SG-23480-DC
19	Top Right Jet Bumper	BLU-ORN	2P12-3, 8P3-13	Q6	SG-23480-DC
20	Bottom Right Jet Bumper	BLU-YEL	2P12-6, 8P3-14	Q8	SG-23480-DC
21	Right Kicker	BLU-GRN	2P12-8, 8P3-15	Q10	SG-23480-DC
22	Left Kicker	BLU-BLK	2P12-9, 8P3-16	Q12	SG-23480-DC
*	Right Flipper	BLU-VIO	7P1-8, 8P3-3	--	30-750-DC
*	Left Flipper	BLU-GRY	7P1-10, 8P3-4	--	SFL-19-400/ 30-750-DC

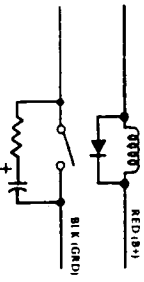
\*NOTES:

1. Special switch connections for solenoids 17 through 22 are as follows:

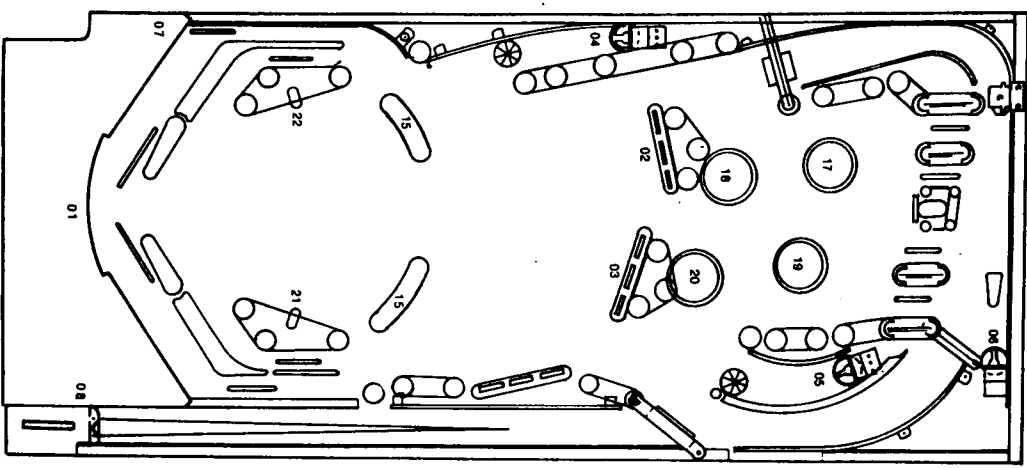
- 17 - ORN-BRN -- 2P13-5, 8P3-5
- 18 - ORN-RED -- 2P13-5, 8P3-6
- 19 - ORN-BLK -- 2P13-2, 8P3-8
- 20 - ORN-GRN -- 2P13-4, 8P3-9
- 21 - ORN-BLU -- 2P13-9, 8P3-10

2. Flipper button connections are as follows:

- Right - ORN-VIO -- 2P12-1, 7P1-7
- Left - ORN-GRY -- 2P12-2, 7P1-9



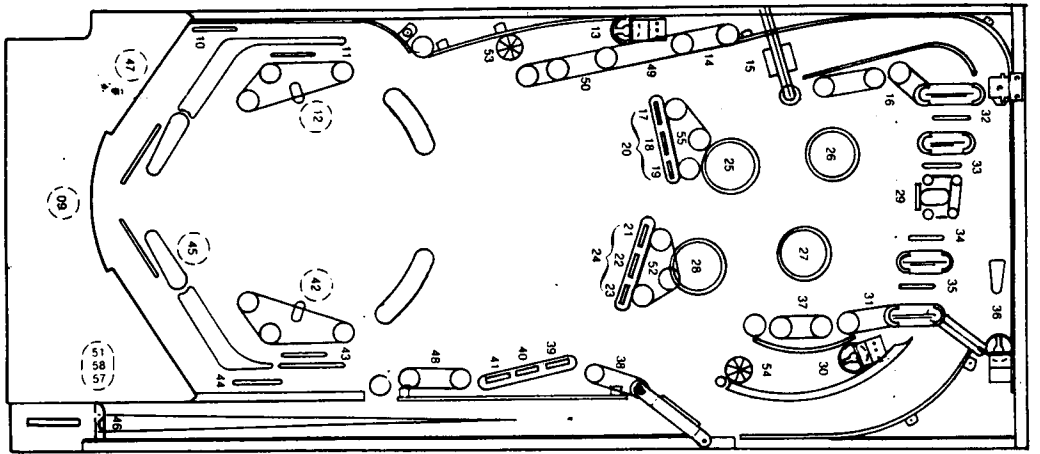
3. Typical wiring for solenoids and special switches:



SOL. NO.	DESCRIPTION
01	Ball Release
02	"1-3" Drop Targets Reset
03	"4-6" Drop Targets Reset
04	Left Eject Hole
05	Right Eject Hole
06	Upper Right Eject Hole
07	Left Ball Saver Kicker
08	Ball Ramp Thrower
09	Sound
10	Sound
11	Sound
12	Sound
13	Sound
14	Credit Knocker
15	Flash Lamps
16	Coin Lockout
17	Top Left Jet Bumper
18	Bottom Left Jet Bumper
19	Top Right Jet Bumper
20	Bottom Right Jet Bumper
21	Right Kicker
22	Left Kicker

Figure 3. Playfield Solenoid Locations and Solenoid Chart

Figure 4. Playfield Switch Locations and Switch Chart



- SWITCH
- 01 1-1 SECTION (500/10)
  - 02 Plumb Bob Tilt
  - 03 Ball Roll Tilt
  - 04 Credit Button
  - 05 Right Coin Switch
  - 06 Center Coin Switch
  - 07 Left Coin Switch
  - 08 Slam Tilt
  - 09 High Score Reset
  - 10 Out-hole
  - 11 Left Outside Roll-over (1000) (3000)
  - 12 Left Inside Roll-over (1000) (3000)
  - 13 Left Kicker (10)
  - 14 Left Eject Hole (1000) (10,000)
  - 15 Upper Middle Left Standup (50)
  - 16 Spinner (100) (1000)
  - 17 Top Left Standup (50)
  - 18 "1" Drop Target (1000)
  - 19 "2" Drop Target (1000)
  - 20 "1-3" Drop Target Series
  - 21 "4" Drop Target (1000)
  - 22 "5" Drop Target (1000)
  - 23 "6" Drop Target (1000)
  - 24 "4-6" Drop Target Series
  - 25 Bottom Left Jet Bumper (100) (1000)
  - 26 Top Left Jet Bumper (100) (1000)
  - 27 Top Right Jet Bumper (100) (1000)
  - 28 Bottom Right Jet Bumper (100) (1000)
  - 29 Top Center Target (1000)
  - 30 Right Eject Hole (1000) (10,000)
  - 31 Triper Top Right Standup (50)
  - 32 "F" Roll-over (1000)
  - 33 "R" Roll-over (1000)
  - 34 "R" Roll-over (1000)
  - 35 "1" Roll-over (1000)
  - 36 Upper Right Eject Hole (1000) (10,000)
  - 37 Lower Top Right Standup (50)
  - 38 Middle Right Standup (50)
  - 39 Top "POWER" Target (1000)
  - 40 Bottom "POWER" Target (1000)
  - 41 Right Kicker (10)
  - 42 Right Inside Roll-over (1000) (3000)
  - 43 Right Outside Roll-over (1000)
  - 44 Right Flipper Lane CHANGE Switch
  - 45 Ball Shooter
  - 46 Plashed Tilt
  - 47 Lower Right Standup (50)
  - 48 Center Middle Left Standup (50)
  - 49 Lower Middle Left Standup (50)
  - 50 Left Ball Ramp
  - 51 "4-6" Drop Target Standup (50)
  - 52 Left Eject Roll-over (1000)
  - 53 Right Eject Roll-over (1000)
  - 54 "1-3" Drop Target Standup (50)
  - 55 Not Used
  - 56 Right Ball Ramp
  - 57 Center Ball Ramp
  - 58 Not Used
- Note: Second score is lit or flashing value

ROW \ COLUMN	1 GRN-BRN	2 GRN-RED	3 GRN-ORN	4 GRN-YEL	5 GRN-BLK	6 GRN-BLU	7 GRN-VIO	8 GRN-GRY
1 WHT-BRN	PLUMB BOB TILT 1	OUTHOLE 9	"1" DROP TARGET 17	BOTTOM LEFT JET BUMPER 25	"I" ROLLOVER 33	BOTTOM "POWER" TARGET 41	CENTER MIDDLE LEFT STANDUP 49	RIGHT BALL RAMP 57
2 WHT-RED	BALL ROLL TILT 2	LEFT OUTSIDE ROLLOVER 10	"2" DROP TARGET 18	TOP LEFT JET BUMPER 26	"R" ROLLOVER 34	RIGHT KICKER 42	LOWER MIDDLE LEFT STANDUP 50	CENTER BALL RAMP 58
3 WHT-ORN	CREDIT BUTTON 3	LEFT INSIDE ROLLOVER 11	"3" DROP TARGET 19	TOP RIGHT JET BUMPER 27	"E" ROLLOVER 35	RIGHT INSIDE ROLLOVER 43	LEFT BALL RAMP 51	NOT USED 59
4 WHT-YEL	RIGHT COIN SWITCH 4	LEFT KICKER 12	"1-3" DROP TARGET SERIES 20	BOTTOM RIGHT JET BUMPER 28	UPPER RIGHT EJECT HOLE 36	RIGHT OUTSIDE ROLLOVER 44	"4-6" DROP TARGET STANDUP 52	NOT USED 60
5 WHT-GRN	CENTER COIN SWITCH 5	LEFT EJECT HOLE 13	"4" DROP TARGET 21	TOP CENTER TARGET 29	LOWER TOP RIGHT STANDUP 37	RIGHT FLIPPER LANE CHANGE SWITCH 45	LEFT EJECT ROLLOVER 53	NOT USED 61
6 WHT-BLU	LEFT COIN SWITCH 6	UPPER MIDDLE LEFT STANDUP 14	"5" DROP TARGET 22	RIGHT EJECT HOLE 30	MIDDLE RIGHT STANDUP 38	BALL SHOOTER 46	RIGHT EJECT ROLLOVER 54	NOT USED 62
7 WHT-VIO	SLAM TILT 7	SPINNER 15	"6" DROP TARGET 23	UPPER TOP RIGHT STANDUP 31	TOP "POWER" TARGET 39	PLAYFIELD TILT 47	"1-3" DROP TARGET STANDUP 55	NOT USED 63
8 WHT-GRY	HIGH SCORE RESET 8	TOP LEFT STANDUP 16	"4-6" DROP TARGET SERIES 24	"F" ROLLOVER 32	MIDDLE "POWER" TARGET 40	LOWER RIGHT STANDUP 48	NOT USED 56	NOT USED 64

Figure 5. Switch Matrix