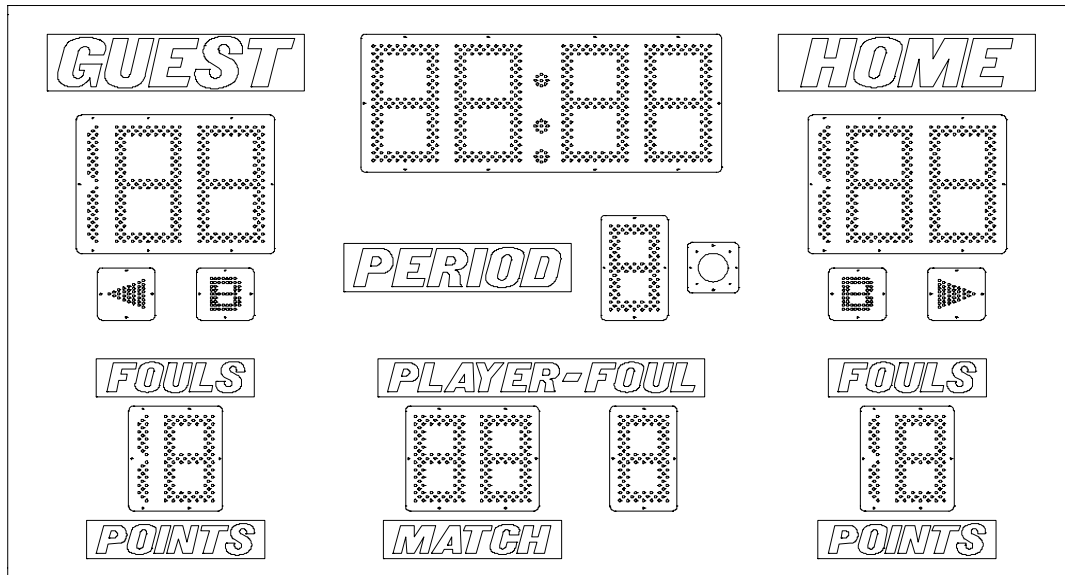# ELECTRO-MECH SCOREBOARD CO.

MODEL 2655 BASKETBALL SCOREBOARD

OWNER'S HANDBOOK

Thank you for choosing an Electro-Mech Scoreboard for your athletic complex. We are confident that your new scoreboard will give many years of reliable service.

Rev. 5 Revised: 02/14/02

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2655 BASKETBALL SCOREBOARD SPECIFICATIONS

GENERAL: This ETL listed scoreboard includes the scoreboard cabinet, mounting hardware, control console, control cable (sold separately), 10 ft. extension cable, and junction box.

DIMENSIONS: 108" L x 60" H x 6" D (2655 with side sponsor panel measures 156" L x 60" H x 6" D) (2655 with two side sponsor panels measures 204" L x 60" H x 6" D)

WEIGHT: Approximately 135 lbs (2655 with side sponsor panel weighs 165 lbs) (2655 with two side sponsor panels weighs 195 lbs)

SCOREBOARD CONSTRUCTION: The outer frame is made from extruded aluminum. Internal structural parts may be extruded aluminum or formed from aluminum sheet. The face and back are made from aluminum sheet. The face is finished with enamel paint. Black is the standard face color. White is the standard color for the sponsor panel and captions.

DISPLAY: The 2655 basketball scoreboard displays HOME and GUEST scores to 199, a 99:00 clock with 1/10th of a second timing, PERIODS to 4, HOME and GUEST bonus and possession symbols, HOME and GUEST team fouls, PLAYER NUMBER and FOULS. It has an internal horn. The volleyball and wrestling captions are mounted on reversible panels at the bottom of the scoreboard.

DIGITS AND SYMBOLS: Light emitting diodes mounted on printed circuit boards form the digits and symbols. The clock is formed with 12" red digits, the HOME and GUEST scores are formed with 12" yellow digits, the PERIOD, PLAYER NUMBER and FOULS are formed with 9" green digits, the HOME and GUEST team fouls are formed with 9" yellow digits, bonus symbols are green, the possession symbols and colon / decimal symbols are red.

POWER REQUIREMENTS: Scoreboard - 120 VAC, 1 A, 60 Hz, 120 watts maximum. The scoreboard has an attached 6 foot power cord. **Control Console** - 120 VAC, 0.5 A, 60 Hz

SCOREBOARD ELECTRONICS: 100% solid state fully enclosed.

CONTROL CONSOLE: The microprocessor control console is constructed of a rugged plastic housing with a metal back plate. It features a 37 key sealed membrane keypad, a LCD display of game information, an attached 6 foot power cord, and a lithium cell battery backup to retain game information.

CONTROL CABLE: The cable has two 22 AWG stranded copper conductors with semi-rigid PVC insulation. It also has a braided shield and a foil shield. The polyethylene jacket is rated at 300 volts. The cable measures approximately ¼" in diameter. One length is required to run from the scoreboard to the point of operation.

JUNCTION BOX AND EXTENSION CABLE: A 4 ¼" x 2 ¼" x 2" junction box with a stereo jack mounted on the face is attached to the control cable at the point of operation. A ten foot extension cable connects the control console to the junction box.

WARRANTY: Five year limited warranty.

SCOREBOARD INSTALLATION

This scoreboard is designed for indoor use only. Installation of the scoreboard consists of mounting the scoreboard cabinet to the wall and making the proper electrical connections.

ATTACHING THE OPTIONAL BOTTOM SPONSOR PANEL

Remove the front panel from the sponsor panel. Align the holes in the top of the sponsor panel with the tapped holes in the bottom of the scoreboard. Fasten the sponsor panel in place using the provided bolts. Note: Tapped holes are only installed in scoreboards that included a bottom sponsor panel as part of the order.

MOUNTING THE SCOREBOARD

Be sure to mount the scoreboard close enough to the wall receptacle so that you can plug in the 6 foot power cord. There are two eyebolts mounted at the top of the cabinet which can be used to lift the scoreboard into place. Once the scoreboard is in the desired location, it can be fastened to the wall using lag bolts or other suitable hardware. Hanger brackets at the top of the scoreboard provide convenient mounting points. Figure 1 shows the mounting point locations for MODEL 2655.
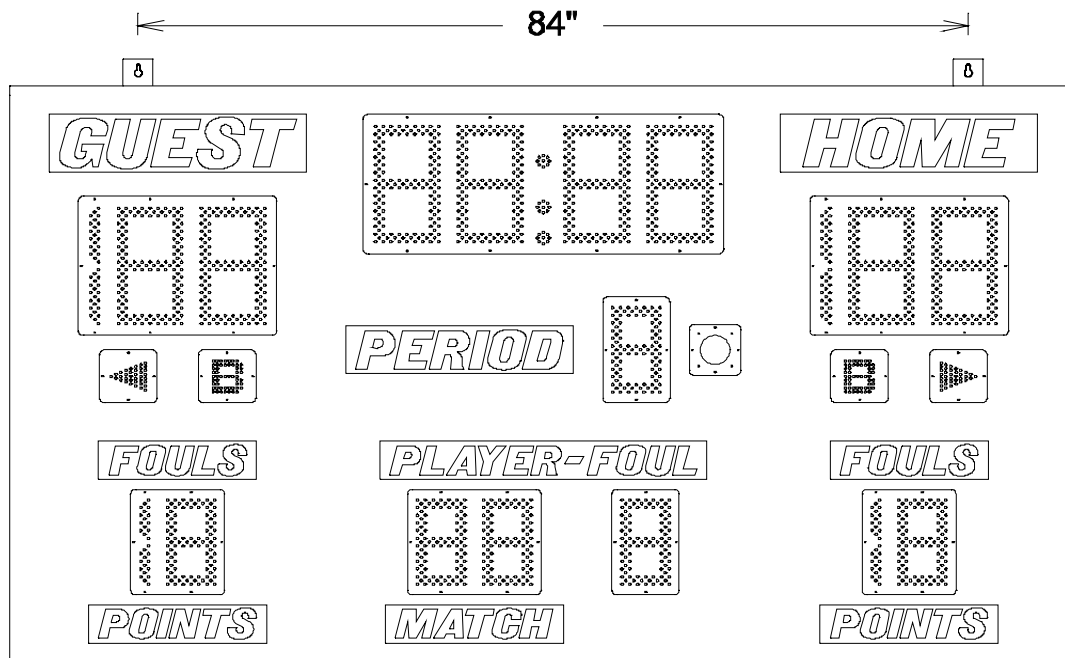

Figure 1 Model 2655 Mounting Points

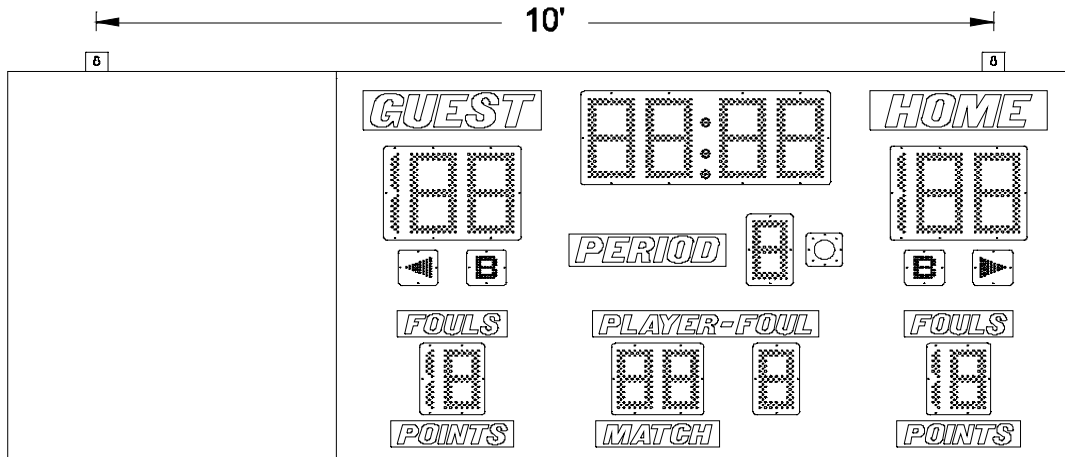Figure 2 shows the mounting point locations for MODEL 2655 with an optional side sponsor panel.

Figure 2 Model 2655 with Optional Side Sponsor Panel Mounting Points

Figure 3 shows the mounting point locations for MODEL 2655 with two optional side sponsor panels.
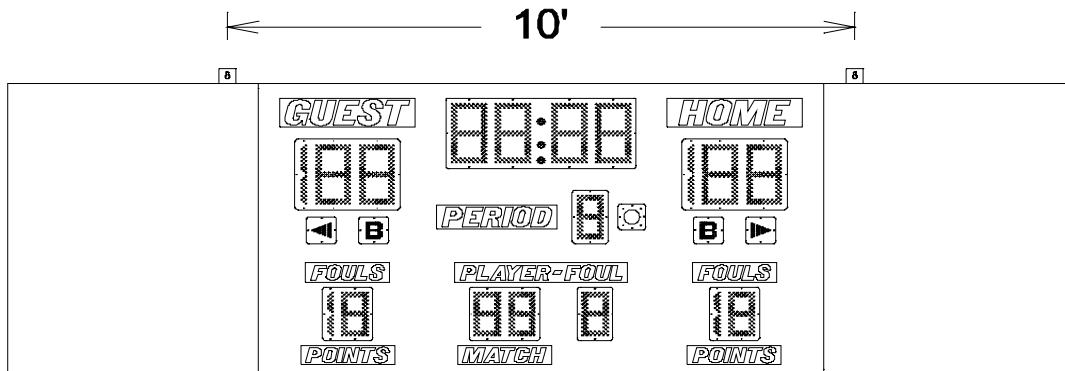

Figure 3 Model 2655 with 2 Optional Side Sponsor Panels Mounting Points

ELECTRICAL CONNECTIONS

This scoreboard was designed to make the electrical connections as easy as possible. These connections include connecting the scoreboard to a power source, installing the control cable, and connecting the control console. Figure 4 shows the electrical connection points on the scoreboard. We recommend a qualified electrician perform the needed electrical connections to ensure proper operation of your scoreboard.
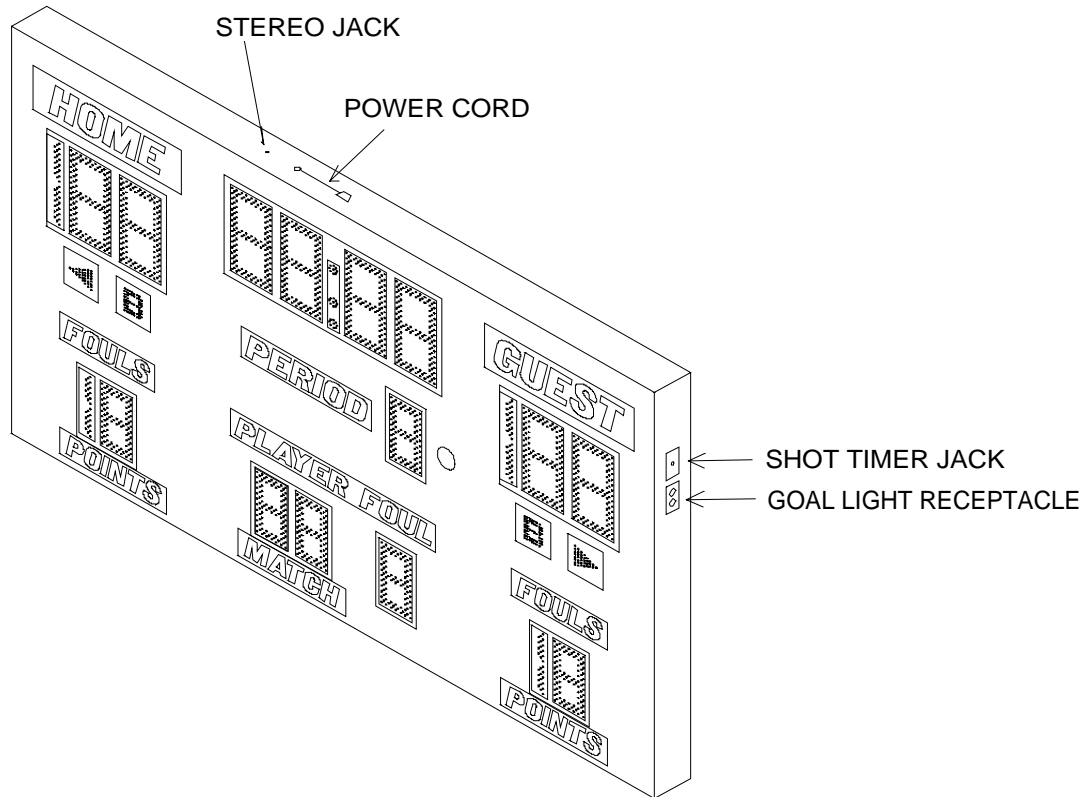
Figure 4 Electrical Connection Points

Connecting The Scoreboard To Your Power Source

The scoreboard requires 120 VAC 1 amp service.   The scoreboard has an 6 foot attached power cord which can be plugged into a NEMA 5-15R receptacle.

ScoreLink 200

The SCORELINK 200 RF MODEM SET is intended to eliminate the control cable between the scoreboard and the control console on Electro-Mech Scoreboard MM and MP series scoreboards. If you have purchased this option, disregard the next section of this manual. Refer to the SCORELINK 200 RF MODEM SET OWNER'S HANDBOOK for installation instructions.

Installing The Control Cable

The control cable connects the scoreboard to the control console. A small junction box with a stereo jack mounted on the face plate is attached to the control cable at the point of operation of the scoreboard. A stereo plug is attached to the scoreboard end of the control cable. The junction box should be securely mounted within ten feet of the rear of the control console. Most customers order the control cable with the junction box and stereo plug attached to the control cable. Some customers prefer to attach them after the cable is installed. Those customers must match their stereo jack to one of the stereo jacks in figure 5 in order to make the proper connections. These connections should be soldered.

STEREN
1/4" STEREO JACK

SWITCHCRAFT
1/4" STEREO JACK

ORANGE

TAN

1
3   2

2
3   1
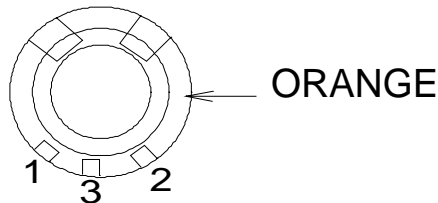
PIN 1 - BLACK WIRE
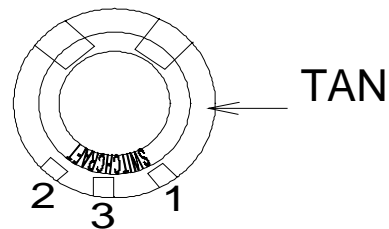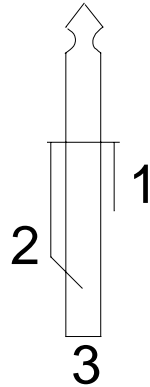PIN 2 - RED WIRE
PIN 3 - SHIELD, GREEN WIRE

Figure 5 Stereo Jack Wiring Diagram

Attach a stereo plug to the scoreboard end of the cable according to the figure 6. Insert the stereo plug into the stereo jack mounted on top of the scoreboard.

PIN 1 - BLACK WIRE
PIN 2 - RED WIRE
PIN 3 - SHIELD WIRE

Figure 6 Stereo Plug Wiring Diagram

Connecting The Control Console
The control console is connected to the junction box via the extension cable. This extra length of cable allows the scoreboard operator some mobility and the ability to store the control console after the game. The control console requires a 120 VAC 1/2 A power source. The power cord can be plugged into a NEMA 5-15R receptacle.

This product is equipped with a 3-wire grounding type plug, a plug having a third (grounding) pin. This plug will only fit into a grounding-type power outlet. This is a safety feature. If you are unable to insert the plug into the outlet, contact a qualified electrician to replace your obsolete outlet. Do not defeat the purpose of the grounding-type plug.

1. Connect one end of the extension cable to the jack on the junction box.

2. Connect the other end of the extension cable to the jack on the rear of the control console.

3. Plug the control console power cord into a 120 VAC outlet.

Installation of Two or More Scoreboards at the Same Site
It is possible to operate up to four scoreboards from the same console. Install a control cable line in the same manner as described previously for each additional scoreboard. Connect the additional control cable lines with extension cables to the control console. **Never splice the control cables together or connect them to the same junction box.**

Goal Lights Installation

A set of goal lights is an accessory which can be used with this scoreboard. Mount the goal lights in the desired location. Splice wires (not provided) to the two wire leads of the goal light. Attach a polarized plug to the other end of the wires. Insert the plug into the goal light receptacle on the right side of the scoreboard cabinet. The goal light receptacle is protected by a 1 amp fuse. Do not insert bulbs greater than 40 watts in the goal lights.

SCOREBOARD OPERATION

The 2655 Scoreboard is operated by the control console. **No scoreboard functions will operate without connecting the control console.** Figure 7 shows the keypad layout on your control console. The various keypad functions are described in the text below the figure.
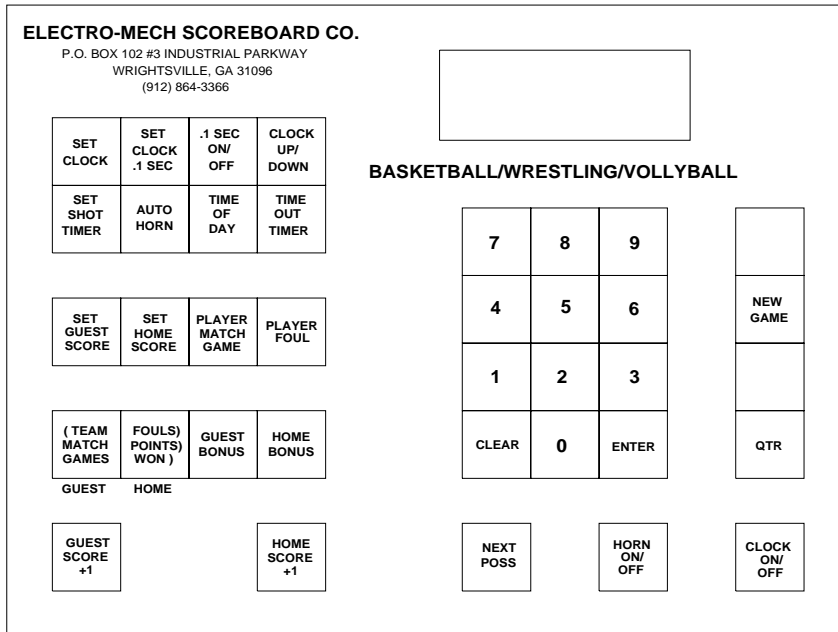
ELECTRO-MECH SCOREBOARD CO.
P.O. BOX 102 #3 INDUSTRIAL PARKWAY
WRIGHTSVILLE, GA 31096
(912) 864-3366

SET CLOCK	SET CLOCK .1 SEC	.1 SEC ON/ OFF	CLOCK UP/ DOWN
SET SHOT TIMER	AUTO HORN	TIME OF DAY	TIME OUT TIMER

BASKETBALL/WRESTLING/VOLLYBALL

SET GUEST SCORE	SET HOME SCORE	PLAYER MATCH GAME	PLAYER FOUL

(TEAM MATCH GAMES	FOULS) POINTS) WON)	GUEST BONUS	HOME BONUS

GUEST   HOME

7	8	9
4	5	6
1	2	3
CLEAR	0	ENTER

NEW GAME

QTR

GUEST SCORE +1		HOME SCORE +1

NEXT POSS	HORN ON/ OFF	CLOCK ON/ OFF

Figure 7 Keypad Layout

Control Console Key Functions

1. **SET CLOCK** – This key sets the time displayed on the scoreboard clock. To set the game clock, press [SET CLOCK]. The console LCD display will read:

   ```
   000  D15:00  0  000
     SET CLK <00:00>
   ```

   Press the keypad numbers for the time, [ENTER]. Example: Press [SET CLOCK], [6], [0], [0], [0], [ENTER] on the control console. 60:00 will be displayed on the clock section of the scoreboard.

Electro-Mech Scoreboard Co. • #3 Industrial Parkway • Wrightsville, GA 31096
Phone: (800) 445-7846 • Fax (478) 864-0212 • Email: score@electro-mech.com

2. **SET CLOCK .1 SEC** – This key is used to enter in times less than 1 minute. To set the game clock to a time less than 1 minute, press [SET CLOCK .1 SEC]. The console LCD display will read:

> 000 D15:00 0 000
>   SET SEC <00.0>

Press the keypad numbers for the time, [ENTER]. Example: Press [SET CLOCK .1 SEC], [5], [3], [8], [ENTER] on the control console. 53.8 will be displayed on the clock section of the scoreboard.

3. **.1 SEC ON OFF** – This key is used to enable or disable the $1/10^{th}$ second mode on the scoreboard when the game clock is below 1:00. This mode is enabled when the control console is reset. If it is disabled, the LCD display on the control console will still show $1/10^{th}$ second timing, but the scoreboard will not display it. To turn this function off, press [.1 SEC ON/OFF]. The console LCD display will read:

> CLOCK ON <1>
> .1 SEC OFF <0>

Press [0], [ENTER] on the control console.

4. **CLOCK UP / DOWN** – The clock can be set up to either count up or count down. The control console will be in the clock down mode when it is reset. To make the clock count up, press [CLOCK UP / DOWN]. The console LCD display will read:

> GAME   UP   <1>
> CLOCK DOWN <0>

Press [1], [ENTER] on the control console. To reset the clock to count down mode, press [CLOCK UP / DOWN], [0], [ENTER] on the control console.

5. **SET SHOT TIMER** – The shot timer default time is 30 seconds. To change this time, press [SET SHOT TIMER]. The console LCD display will read:

> 000 D15:00 0 000
>   ST RESET <30>

Press the keypad numbers for the time, [ENTER]. The LCD display will then read:

> 000 D15:00 0 000
> ST-OB RESET <05>

This will allow you to change the out of bounds time. The default out of bounds time is 5 seconds. To change this time, press the keypad numbers for the time, [ENTER].

6. **AUTO HORN** – This key allows the operator to control the end of period horn and / or the time out horn. The horn normally sounds for two seconds when the clock reaches 0:00. The end of period horn can be disabled by pressing [AUTO HORN].

```
GAME  PRESS <1> ON
HORN   PRESS <0> OFF
```

The console LCD display will read:

Press [0], [ENTER] to disable the horn. The console LCD display will then read:

```
T-O     PRESS  <1>     ON
HORN  PRESS  <0>     OFF
```

The time out horn is normally disabled. To enable the horn to sound at the end of the time out, press [1], [ENTER] on the control console.

7. **TIME OF DAY** – The time of day can be displayed on the clock section of the scoreboard. **THE GAME CLOCK WILL BE INOPERABLE UNTIL THE TIME OF DAY FUNCTION IS TURNED OFF**. To turn the time of day clock on, press [TIME OF DAY]. The console LCD display will read:

```
TIME OF            ON  <1>
DAY  CLOCK      OFF <0>
```

Press [1], [ENTER] on the control console. The console LCD display will then read:

```
000  D15:00  0  000
   SET CLK <12:00>
```

Press the keypad numbers for the time, [ENTER]. The scoreboard will display the time of day.

8. **TIME OUT TIMER** – To set the Time Out timer, press [TIME OUT TIMER]. The console LCD display will read:

```
000  D15:00  0  000
   SET T-O <1:00>
```

Press the keypad numbers for the time, [ENTER]. The time out timer will immediately count down toward 0. While the Time Out timer is displayed on the console LCD display, it is not displayed on the scoreboard. Press [TIME OUT TIMER] a second time to exit this mode before the timer reaches 0.

9. **SET GUEST SCORE** – To set the guest score, press [SET GUEST SCORE]. The console LCD display will read:

```
000   D15:00    0 000
GUEST SCORE <000>
```

Press the keypad numbers for the score, [ENTER]. EXAMPLE: To set the guest score to 53, press [SET GUEST SCORE], [5], [3], [ENTER].

10. **SET HOME SCORE** – To set the HOME score, press [SET HOME SCORE]. The console LCD display will read:

```
000   D15:00    0 000
 HOME SCORE <000>
```

Press the keypad numbers for the score, [ENTER]. EXAMPLE: To set the HOME score to 75, press [SET HOME SCORE], [7], [5], [ENTER].

11. **PLAYER MATCH GAME** – This key is used to display the player who commits a foul in basketball, the match number in wrestling, and the game number in volleyball. No change is required on the console to change sports. To set the player number, match number, or game number press [PLAYER MATCH GAME]. The console LCD display will read:

```
000   D15:00    0 000
  PLAYER NO. <00>
```

Press the keypad numbers for the player number, match number, or game number, [ENTER]. EXAMPLE: To set the player number to 15, press [PLAYER MATCH GAME], [1], [5], [ENTER].

12. **PLAYER FOUL** – This key is used to display the number of fouls that a player has committed. To set the player foul press [PLAYER FOUL]. The console LCD display will read:

```
000   D15:00    0 000
PLAYER FOULS  <0>
```

Press the keypad number for the player fouls, [ENTER]. EXAMPLE: To set the player fouls to 3, press [PLAYER FOUL], [3], [ENTER].

11. **(TEAM (MATCH (GAMES GUEST** – This key is used to increment the number of fouls that the guest team has committed in basketball, the points scored in a bout in wrestling, or the games won in volleyball. No change is required on the console to change sports.

12. **FOULS) POINTS) WON) HOME** – This key is used to increment the number of fouls that the home team has committed, the points scored in a bout in wrestling, or the team serving in volleyball. No change is required on the console to change sports.

13. **GUEST BONUS** – This key toggles the guest bonus symbol (B) on and off.

14. **HOME BONUS** – This key toggles the home bonus symbol (B) on and off.

15. **GUEST SCORE +1** – This key increments the guest score by one point.

16. **HOME SCORE +1** – This key increments the home score by one point.

17. **NEXT POSS** – This key toggles the possession arrow symbol between guest and home.

18. **HORN ON/OFF** – This key is used to sound the horn for ½ second.

19. **CLOCK ON/OFF** – This key is used to start and stop the clock.

20. **NEW GAME** – This key is used to reset all the scoreboard functions to their default settings. To reset the scoreboard, press [NEW GAME]. The console LCD display will read:

```
RESET              YES  <1>
SCOREBOARD      NO   <0>
```

Press [1], [ENTER] on the control console. The LCD display then reads:

```
ELECTRO-MECH        VER
SCOREBOARD          B23
```

After about two seconds, the LCD display changes to show the scoreboard information and the scoreboard will reset its functions.

21. **QTR** – This key increments the quarter digit by 1.

22. **CLEAR** – This key clears the information being entered into the control console.

The optional goal lights are turned on when the horn sounds.

CLOCK ON / OFF HAND HELD UNIT OPERATION

There are two versions of this accessory. The older version is a rectangular box with one button and a LED. The newer version has a cylindrical body with a bottom on the top. Both versions have an attached cable that plugs into a jack on the control console back plate labeled Clock Hand held. This accessory performs the same function as the CLOCK ON / OFF key on the console keypad.

REVERSIBLE CAPTION PLATES

There are three reversible caption plates located at the bottom of the scoreboard. These plates have the proper captions for playing volleyball and wrestling. The caption plates are held in place with small metal tabs. To change a caption, slide the plate out, turn it so the other side is visible, and slide it back into position. The proper set of captions for wrestling is POINTS, MATCH, and POINTS. The proper set of captions for volleyball is WON, GAMES, and WON.

You should reset the scoreboard each time that it is turned on. Test out all the functions to ensure that the scoreboard is operating properly. **Electro-Mech Scoreboard Company strongly advises that you unplug the control console, disconnect the extension cable at the control console, and turn the power to the scoreboard off when the scoreboard is not in use**. **The control console can not turn the scoreboard off.** This action will help protect the scoreboard and control console from power surges and lightning strikes.

SERVICING THE SCOREBOARD

While your scoreboard was designed for years of trouble-free operation, some problems may occasionally occur. Our trained personnel at Electro-Mech Scoreboard Company are available to answer your questions from Monday to Friday during the hours of 8 AM to 5 PM Eastern Standard Time. Be sure to know your scoreboard model number when calling. Replacement parts are always available. Parts can be repaired at significant savings when compared to the price of new units. Our convenient toll free number is listed at the bottom of every page in this manual. Be sure to make note of the specific problems that your scoreboard is experiencing.

The scoreboard electronics can be accessed by removing the PERIOD panel. Figure 8 shows the layout of the scoreboard electronics.
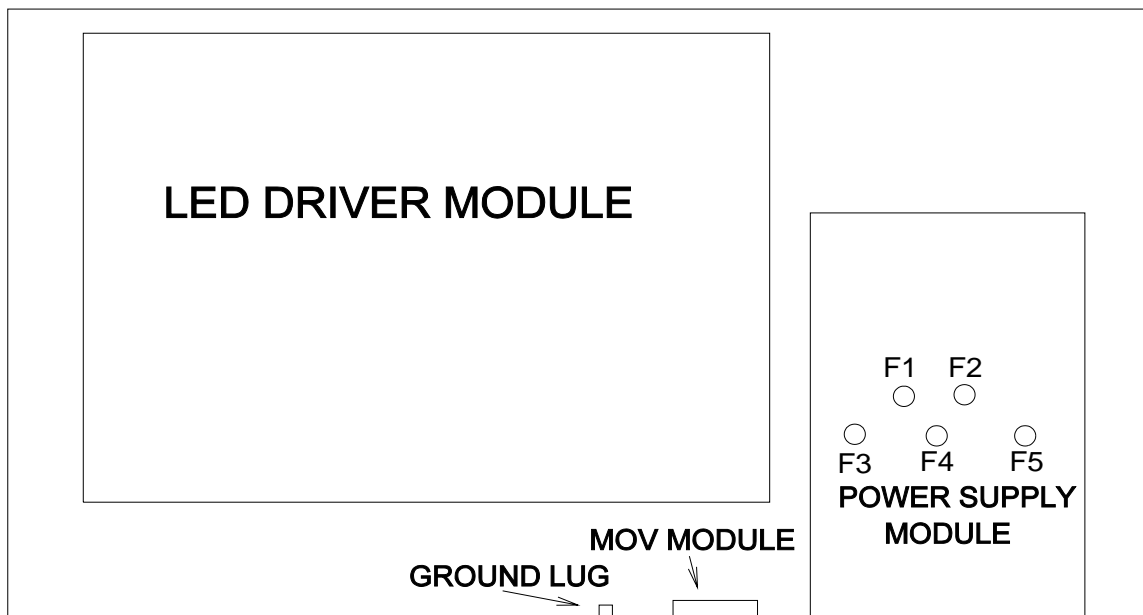

Figure 8 Scoreboard Electronics

The LDM1 LED DRIVER MODULE performs all scoreboard functions. The LPS-130VA POWER SUPPLY MODULE provides the power to all the scoreboard electronics. The MOV MODULE is used for surge protection.

The table below lists the fuses, the fuse ratings, and their functions.

FUSE NUMBER	FUSE RATING	FUNCTION
F1	5A 250 V	DC POWER INPUT #1
F2	5A 250 V	DC POWER INPUT #2
F3	1A 250V	GOAL LIGHTS
F4	1A 250V	HORN
F5	3A 250V	MAIN AC LINE

ELECTRO-MECH SCOREBOARD CO. FIVE YEAR LIMITED WARRANTY

THE ELECTRICAL COMPONENTS OF ALL ELECTRO-MECH SCOREBOARDS ARE GUARANTEED FOR A PERIOD OF FIVE (5) YEARS FROM THE DATE OF INVOICE AGAINST DEFECTS IN WORKMANSHIP OR MATERIAL AND WILL BE REPLACED OR REPAIRED WITHOUT COST TO THE OWNER PROVIDED THE EQUIPMENT OR PARTS ARE RETURNED POSTAGE-PAID TO THE FACTORY IN WRIGHTSVILLE, GA. SHIPPING BACK TO THE OWNER WILL BE VIA UPS GROUND SERVICE EXCEPT WHEN AIR OR SPECIAL METHOD OF RETURN IS SPECIFIED BY THE OWNER, IN WHICH CASE SHIPPING WILL BE FREIGHT COLLECT.

EXCLUDED FROM THIS WARRANTY ARE FUSES.

THIS WARRANTY DOES NOT INCLUDE LABOR CHARGES INCURRED IN THE REMOVAL OF COMPONENT PARTS, SERVICE CALLS, OR DAMAGES RESULTING FROM IMPROPER INSTALLATION, IMPROPER OPERATION, OR PROBLEMS CAUSED BY ANY REPAIR, ALTERATION OR MODIFICATION OF THE SCOREBOARD NOT PERFORMED BY ELECTRO-MECH.

EQUIPMENT WHICH IS SUBJECTED TO ACCIDENT, NEGLECT, ABUSE, MISUSE OR OTHER NATURAL DISASTERS, INCLUDING BUT NOT LIMITED TO FIRE, WIND, LIGHTNING, OR FLOOD, IS NOT COVERED BY THIS GUARANTEE.