

Summary	Troubleshooting guide for LGB Light Curtains				
Products Affected	All doors with LGB Light Curtains				
Key Word Tags					
Tools/Equipment (If Required)					
Parts/Materials (If Required)					
Related Media					
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Please Read The Entire Bulletin Before Proceeding

As part of our product enhancement, LGB blanking light curtains are offered with a variety of doors and can be retrofit into spiral model doors. The purpose of this bulletin is to assist with troubleshooting of the LGB light curtains.

Note: After installation, remove the protective plastic film from the transmitters and receivers. The door must start at the fully open position and the path of the light curtains clear to begin setting limits. The door will want to set the open limit first, and then travel to the closed position.

The LED status on the light curtains can be used to help determine the potential issues.

LED green	State
Off	TST LGB disconnected from power
On	Voltage is present but it has a bad light curtain
Flashing (.5Hz)	Normal operation
LED yellow	State
Off	Normal operation or no power
On	Not defined
Flashing (0.5Hz)	Internal error, testing not successful
Flashing (5Hz)	RS485 communication problem to TST LGB Receiver

LED blue	State
Off	TST LGBS disconnected from power
On	Voltage is present but it has a bad light curtain
Flashing (0.5Hz)	Normal operation
LED red	State
Off	Normal operation
On	Blocked beam (danger zone or object zone)
Flashing (1Hz)	Internal error, testing not successful
Flashing (5Hz)	Faulty RS485 communication with door controller
Flashing (10Hz)	One light beam is blocked and another one with bad signal quality.

The following fault codes can also help to determine the issues with the light curtains.

No.	Type	Description	Possible cause
F.601	disturbance	Reception quality too bad	Reception quality when commissioning the light curtain is too low. TST LGB is dirty. Protective film not removed. Badly aligned. Wrong range parameters configured. Check and adjust P.44A. Set to 10
F.610	fault	Light curtain alignment	Light curtain alignment has not yet completed. Confirm the light curtain alignment
F.611	disturbance	LL Pos. values not plausible	Values stored by the light curtain are unsuitable for the door's route. Objects within the door's area when setting limits. Hanging packaging or protective plastic film on the door's sheet when setting limits.
F.612	disturbance	RS-485	RS485 communication disturbed. Invalid position data. A and B leads swapped or wiring incorrect.
F.613	disturbance	Transmitter communications	Communication between receivers and transmitters not operating properly. A and B leads swapped or wiring incorrect.
F.615	fault	Internal to transmitter	Hardware defective. Replace the light curtain.
F.616	fault	Internal to receiver	Hardware defective. Replace the light curtain.
F.617	fault	Incompatibility	Incompatible Hardware version. Replace Hardware with the same or compatible version. (Confirm at P.931 [transmitter] and P.932 [receiver]. The versions should match.) Incompatible Software revision. Synchronize via Software update. (Confirm at P.931 [transmitter] and P.932 [receiver]. The versions should match.)
F.618	fault	Customer-specific coding	One of the light curtain elements has an invalid customer number
F.621	fault	Test error (transmitter)	Self-test error on the transmitter. Confirm all wiring connections.
F.622	fault	Test error (receiver)	Self-test error on the receiver. Confirm all wiring connections.

F.626	fault	Test error (Out 1)	Test or wiring error on OUT1. Confirm all wiring connections.
F.627	fault	Test error (Out 2)	Test or wiring error on OUT2. Confirm all wiring connections.
F.628	fault	Dark test error	Error during self-test. Possibly disturbing ambient light source. Check for sunlight, cross talking from another safety device, or reflections interfering with the light curtains.

Info code:	Name	Explanation
I.610	Light curtain alignment res.	Light curtain alignment completed successfully.
I.615	Light curtain alignment req.	Light curtain alignment requested.
I.620	Blanking at the top	Door is in "end position open" when synchronizing but certain light beams are blocked.
I.621	Resolution of position sensor too low.	The resolution of the position sensor is too low for reliable light curtain operations. Each doorway requires more increments. (Message issued only when programming switch is switched on.) Check the resolution adjustment at P.202

If you have any questions please contact Rytec Customer Support at 1-800-628-1909.