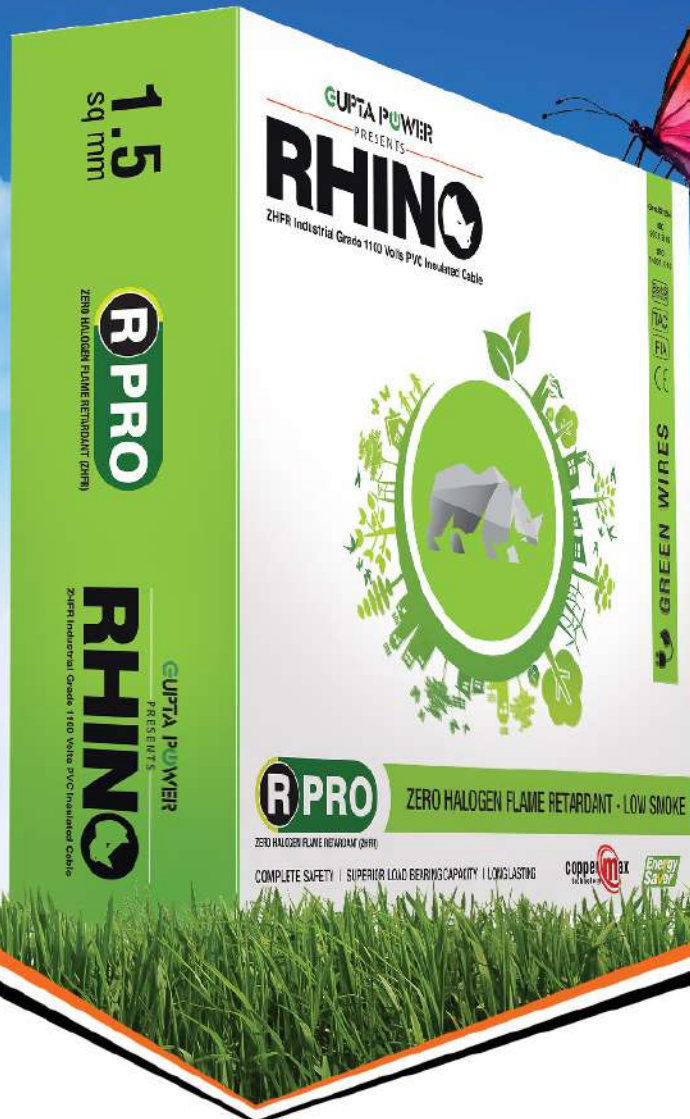


# SAFE, SECURE AND GREEN

Environment-Friendly Green Wires



- Zero-Halogen
- Flame-Retardant
- High-Efficiency

**GUPTA POWER®**

PRESENTS

**RHINO**

SMART CONDUCTORS | CABLES  
WIRES | OFC | LED LIGHTING | EPC  
WIRE RODS | SOLAR

# RHINO - 'PRO' ZERO HALOGEN FLAME RETARDANT LOW SMOKE (ZHFR-LS) BUILDING WIRES

## SAFE

RHINO ZHFR-LS wires are flame-retardant, fire-resistant and are made of halogen-free buildings wires compound and have a high oxygen index. Unlike PVC wires, these wires can contain fire, generated due to sudden short circuits. It also reduces smoke, toxic fumes and corrosive gases on burning, thus, making rescue and firefighting activities easier.

## SECURE

RHINO ZHFR-LS wires are insulated with non-toxic, EVA based, flame-retardant, halogen-free compound. Thus, generating almost zero toxic gases even during fire. The release of halogen content is less than 0.5%. These features help in curbing the spread of fire even at a very high temperature.

## GREEN

RHINO ZHFR-LS wires are powered by Coppermax Technology that ensures higher conductivity of electricity resulting in less energy loss. Moreover these environment-friendly wires are practically halogen-free. To sum up, Rhino ZHFR-LS wires not only protect our present but also contribute towards a greener future.

## FIRE AND SMOKE EVALUATION

TEST	SPECIFICATION	VALUES
Limiting Oxygen Index	ASTMD-2863	> 35%
Temperature Index	IS:10810 (64) or ASTM D - 2863	> 280°C
Smoke Density Rating	ASTM D - 2843	< 9.0%
Acid Gas Generation	IEC - 60754 - 1	< 0.5%
Light transmission (visibility) during cables	ASTMD-2863 burning	80%

### Ordinary PVC wires

Easily catches fire and releases black smoke and toxic gases while burning

### ZHFR-LS wires

Superior fire-resistant and does not emit toxic smoke even while burning

- **Application:** Wiring in all applications where fire safety is of utmost importance like - schools, theatres, commercial complexes, apartments, laboratories, hotels, stadium and public spaces

- **Technical Data:**

**Voltage Grade:** Up to and including 1100V

**Conductor:** The conductor is thin drawn for uniformity of resistance, dimension, flexibility, purities from bright electrolytic grade copper (more than 101% conductivity), annealed and bunched together

**Insulation:** The bunched conductor is insulated with special grade of Zero Halogen Flame Retardant (ZHFR) compound.

The insulation does not melt or drop in case of fire or flame. The used compound has anti-rodent, anti-termite properties and are non-toxic and non-corrosive in nature

**Colours:** Red, Yellow, Blue, Black, Green and other colours on demand

### Single core unsheathed cables in voltage grade 1.1 KV as per Gen. IS : 694

Nominal Cross-Sectional Area of Conductor	Number/ Nom. Dia. of Cond. Strands#	Thickness of Insulation (Nom.)	Approx overall Diameter	Current Carrying Capacity*	Maximum Conductor Resistance per Km at 20°C
				2 wires, Single Core	
sq. mm	mm	mm	mm	amps	ohm/km
0.75	24/0.2	0.6	2.5	10	26.00
1.0	14/0.3	0.7	2.7	14	18.10
1.5	22/0.3	0.7	2.9	19	12.10
2.5	36/0.3	0.8	3.6	26	7.41
4.0	56/0.3	0.8	4.1	35	4.95
6.0	84/0.3	0.8	4.7	44	3.30

\* Current rating as per IS : 3961 - 1968 (Part - V)  
# Conductor : Class - 2 as per IS : 8130 - 1984

### Corporate Office

Cuttack Road, Bhubaneswar - 751 006, Odisha, India  
Phone: +91-674-2313898/2312945 • Fax: +91-674-2312083  
Email: info@guptapower.com, rhino@guptapower.com

### Registered Office

EN 62, 7th Floor, Sector - V, Salt Lake City, Kolkata - 700 091  
Phone: +91-33-40657348 • Email: kolkata@guptapower.com

