Manufacturing for Performance and Efficiency at SKYLINE

HOISTS | FLAME PROOF HOISTS | EOT CRANES
GOODS LIFT | JIB CRANES | GANTRY CRANES
CORPORATE INFORMATION

Motto
To manufacture products for performance and efficiency in the highest standards of quality, that we set for ourselves and elevate expectation of our clients.

Vision
To keep abreast with the latest technology and manufacturing processes, sustain growth and achieve targets within our frame of reference, time and resources.

Mission
To deliver what client wants and maintain our customer relations before and after sales. Prompt response to needs, dynamic and total solutions of applications.
Profile
SKYLINE has established itself as one of India's leading names in the field of integrated conglomerate of engineering EOT Cranes, HOT Cranes and Material Handling Equipment with our promise of quality products for highest performance and maximum efficiency.

SKYLINE expertise in designing optimal solution which has been shaped over years in the field of manufacturing cranes & hoists. Being pioneers in cranes, we have marked our excellence in other material handling equipment also.

We believe in not only making cranes to lift your material but in creating giant brains to uplift your comfort and satisfaction to the highest altitude with the greatest attitude. SKYLINE caters to the needs of its customers with highest standards of innovation and quality.

Our sales specialists are well trained and sensitive to market requirements. They are updated with the most recent events in industry thereby enabling them to share with you not just product details but an engineering solution. Moreover, our team of technical experts is capable to provide guidance on some complex in-plant material movements.

Manufacturing Unit
Our corporate office and manufacturing unit is located at Sanwer Road, Indore. The infrastructure of plant is fully equipped with the latest machinery and spreads over 55000 square feet of area.

Our Assets
• Hi-tech facilities
• Wide range of innovative products
• Talented research & development team
• World class manufacturing

Quality Assurance
Our efforts are focused on
• Leveraging latest technology trends
• Continuous improvement according to customer’s requirement
• Providing reliable & low cost products
• Best service support
• Giving 100% satisfaction to our customers
MANUFACTURING FOR

PERFORMANCE &

EFFICIENCY

HOISTS

OVERHEAD EOT CRANES

JIB CRANES

GANTRY CRANES
MANUFACTURING FOR PERFORMANCE & EFFICIENCY

SKYLINE offers outstanding quality, efficiency and reliability at the highest level.

SKYLINE CRANES & HOISTS are designed and manufactured in accordance with Indian standards considering adequate factor of safety with respect to duty classification.

- Proven crane geometry with welded crane girders guarantees high design rigidity, optimum travel characteristics and minimum wear and tear.

- Raised crane girder designs are tailored to match the roof structure and compact crabs with minimum approach dimensions makes larger hook paths as well as better utilization of the available space, reduce initial construction and subsequent costs.

- Variable speed control in all motions, thanks to AC frequency for reducing load sway, facilitating exact and gentle positioning and also lowers the mechanical load on the crane installation.

- High lifting and cross travel speeds provide faster handling rates and greater efficiency.

Technical Specifications:

<table>
<thead>
<tr>
<th>Crane Type</th>
<th>Wire Rope Hoists</th>
<th>Single girder overhead traveling crane</th>
<th>Double girder overhead traveling crane</th>
</tr>
</thead>
<tbody>
<tr>
<td>SWL* upto</td>
<td>1.5t</td>
<td>1.5t</td>
<td>100t</td>
</tr>
<tr>
<td>Span* upto</td>
<td></td>
<td>30m</td>
<td>30m</td>
</tr>
<tr>
<td>Long travel speed* upto</td>
<td>60m/min</td>
<td></td>
<td>60m/min</td>
</tr>
<tr>
<td>Cross travel speed* upto</td>
<td>30m/min</td>
<td></td>
<td>30m/min</td>
</tr>
<tr>
<td>Lifting speed* upto</td>
<td>12m/min</td>
<td></td>
<td>12m/min</td>
</tr>
</tbody>
</table>
Salient Features of SKYLINE Cranes

Structural Design
For design of girder & end carriages, the most critical structural components in an EOT crane, we use static calculation developed through our vast experience wherein major design considerations like horizontal stress, vertical stress, deflection at load and fatigue limits are checked simultaneously for deriving optimum section. The design also undergoes vibration analysis.

The crab - trolley structure is characterized by lighter weight due to efficient design – lesser structural members (base frames holding wheels and members holding rope drum-gear box & other winch components). The lighter crab helps reduce & optimize the girder & end-carriage weight further.

All major welding process in manufacturing is carried out by CO₂ welding.

Main Hoist Unit
Made of precisely matched components, SKYLINE open winches satisfy the most stringent requirements of up-to-date crane engineering.

The open winch unit consists of:
- A rope drum with cut grooves, flanges on both sides, mounted on self-aligning roller bearings arranged to meet structural requirements.
- A helical geared hoisting gearbox with fabricated housing and a horizontal joint.
- The torque arm is adjustable and stress-free.
- The drive shaft of the gearbox is connected directly to the rope drum.
- A squirrel-cage rotor motor as lifting motor (frequency inverter-controlled).
Hoist Motors
Squirrel cage, crane duty motors as per IS: 325 and operated through VFD.

Advantages
- Over temperature detection of motors using 3 PTC thermistors.
- Hoist motors standard with IP 55 enclosure and class F insulation with temperature rise restricted to class B.

Hoist Shoe Brake

Advantages
- Completely enclosed type protecting against dust and dirt and at par with IP65.
- Hydraulic actuation of thruster thereby reducing power consumption.

Hoist Gear Boxes

Advantages
- Extremely high service life due to hardened and ground gears in oil bath and results in quiet operation.
- Horizontally split gearbox for reduced repair and maintenance costs.
- Oil leakage is completely avoided.
FEATURES

Travel Geared Motors

Advantages:
- Shaft mounted on wheel axle with torque arm, which results in less vibration and no alignment problems.
- Heavy and overhang Long travel platform is avoided. Compact in design and less mechanical losses.
- Less power consumption due to use of hardened and ground gearboxes.
- All rotating parts are covered inside casing hence considered safer than conventional drive with floating shaft.
- Less maintenance required as floating shaft, shaft covers, geared couplings and its covers are not required.
- Provision of manual brake release lever. Hence, the load can be removed from the danger zone in the event of power failure.

Wire Rope
Power form, 6 x 36 constructions and strength 1960N/mm².
Make - Usha Martin.

Advantages:
- Compact high strength wire rope with higher fatigue life than conventional wire rope.
- High steel fill factor results in higher minimum breaking strength and smooth exterior strand surface leads to reduce the abrasion wear of pulleys, drum & rope.
Travel Wheel
Forged wheel of C55Mn7.5 material, sorbitised to 300 – 350 BHN for depth of 10 mm

Advantages
• Large wheel diameters ensure safe, reliable crane travel
• Also, compensates for any possible crane runway tolerances
• A long life and high overload capacity

Frequency Inverter
SKYLINE uses inverter/VFD with specially designed crane software.

Features
• Direct Torque Control (DTC) for dynamic travel and hoist drives
• Increased IP 55 enclosure up to size R6Solutions for special environments
• Automatic parameter identification for fast and simple commissioning

Advantages
• Speed monitoring function
• Torque proving & monitoring function
• Torque memory function
• Higher speeds at partial load (power optimization-optional)
• Intelligent brake logic: Brake release contact evaluation
SKYLINE HOISTS offer exceptional performance, easy load handling, superior safety, improved ergonomics and favorable dimensions, for cranes, solo hoist or monorail applications or for upgrading existing hoisting equipment. The range meets a wide variety of application requirements. Various available lifting capacities, speeds, trolley types, duty classes and the comprehensive range of standard and additional features guarantee effective, safe and reliable solutions for your lifting needs.
Benefits & Features

SKYLINE HOISTS can be expected to last for multiple lifetimes due to the large rope drum diameter and rope angles which reduce stress and bending forces. Safety and reliability are enhanced by the excellent power transmission and braking systems. Revolutionary compact and innovative design concept makes these high performance hoists, smaller in size. Reduced hook approaches create more usable work space. The gears used are manufactured with extreme accuracy, which combined with hardened and ground gear fabrication; means trouble free operation even after years of intensive use.

Technical Specifications:

<table>
<thead>
<tr>
<th>Specification</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Safe working load</td>
<td>250 Kgs to 1.5 Tons</td>
</tr>
<tr>
<td>Heights of lift</td>
<td>As per customer applications</td>
</tr>
<tr>
<td>Class of duty/standards</td>
<td>Equivalent to M5 and M7 as per IS: 3938 classification</td>
</tr>
<tr>
<td>Speeds</td>
<td>Selected depending on client specifications/applications</td>
</tr>
<tr>
<td>Hoist controls</td>
<td>From floor through pendant push buttons. Optionally through radio remote control</td>
</tr>
<tr>
<td>Drive systems</td>
<td>Through squirrel cage induction motors with helical gear boxes with fail safe brakes</td>
</tr>
<tr>
<td>Motors</td>
<td>Squirrel cage induction motors for hoisting and cross travel. Insulation class F, degree of protection IP55, ambient temperature 45°C, 150 starts/stops per hour, duty S4, CDF 40%, conforms to IS:325</td>
</tr>
<tr>
<td>Brakes</td>
<td>Electro hydraulic thrustors/disc brakes for all motions. DC/AC electro magnetic brakes or additional brakes can be provided on request</td>
</tr>
<tr>
<td>Power supply system</td>
<td>To hoist and cross travel through trailing cables/drag chain, shrouded bus bars (depending on customer’s choice and application)</td>
</tr>
</tbody>
</table>

Diagrammatic Representation
SKYLINE SINGLE GIRDER OVERHEAD EOT CRANES feature maximum rigidity for a minimum dead weight. This keeps the load on the crane runway low and a cost-effective design can be selected for the building. They also offer the benefits of outstanding crane geometry, resulting in exceptional travel characteristics enabling the crane to meet your requirements for higher efficiency.

Benefits & Features
- Plate box section as the crane girder
- End carriages of welded box girder construction
- Connections between the main girder and end carriages manufactured to mechanical engineering tolerances for minimum wear and tear.
- Low-headroom design with wire rope hoist, offering particularly favorable hook approach dimensions to serve the largest possible area
- Control pendant suspended for separate travel on the crane girder
- Paint finish in semi-matt golden yellow and travel drives in silver grey
Technical Specifications:

<table>
<thead>
<tr>
<th>Safe working load</th>
<th>250 Kgs to 1.5 Tons</th>
</tr>
</thead>
<tbody>
<tr>
<td>Span</td>
<td>4m to 30 m</td>
</tr>
<tr>
<td>Heights of lift</td>
<td>As per customer applications</td>
</tr>
<tr>
<td>Class of duty/standards</td>
<td>Equivalent to M5 and M7 as per IS: 3177/IS: 807 classification. Hoists are as per IS: 3938 classification</td>
</tr>
<tr>
<td>Speeds</td>
<td>Selected depending on client specifications/applications</td>
</tr>
<tr>
<td>Crane controls</td>
<td>From floor through pendant push buttons. Optionally through radio remote control</td>
</tr>
<tr>
<td>Drive systems</td>
<td>Twin drive through squirrel cage induction motors with single self lubricated helical gear boxes with fail safe brakes</td>
</tr>
<tr>
<td>Motors</td>
<td>Squirrel cage induction hoisting motors for hoisting, cross travel and long travel. Insulation class F, degree of protection IP55, ambient temperature 45°C, 1.50 starts/stops per hour, duty S4, CDF 40%, conforms to IS: 325</td>
</tr>
<tr>
<td>Brakes</td>
<td>Electro hydraulic thrustors/disc brakes for all motions. DC/AC electro magnetic brakes or additional brakes can be provided on request.</td>
</tr>
<tr>
<td>Power supply system</td>
<td>To hoist and cross travel through trailing cables/drag chains. To crane through shrouded bus bars/trailing cable/MS angle bus bar/bare copper conductors (depending on customer's choice and application)</td>
</tr>
</tbody>
</table>

Optimum adaptation to the building design
SKYLINE DOUBLE GIRDER OVERHEAD EOT CRANES offer you a virtually unmatched deadweight/load capacity ratio. They are also characterized by their outstanding crane geometry, ensuring extremely favorable travel characteristics and therefore minimizing wear and tear. Particularly, large lifting height is derived from the fact that the load hook can be raised between the two crane girders. Depending on requirements, our double-girder overhead traveling cranes can also be fitted with radio or operator cabin controls. Optional maintenance platforms and accessible crabs not only makes crane maintenance easy but also ensures that your hall fittings such as lamps, heating elements or supply lines can be quickly and easily be reached.
Benefits & Features
- Consistent quality with overhead traveling crane benefits
- Thanks to double-girder design facilitating high performance & high travel speeds
- Low deadweight reduces investment layout
- Additional fittings
  - Optional maintenance platform for building repairs
  - Operator cab control as a crane control variant

Technical Specifications:

<table>
<thead>
<tr>
<th>Safe working load</th>
<th>1 Ton to 100 Tons</th>
</tr>
</thead>
<tbody>
<tr>
<td>Span</td>
<td>6m to 30m</td>
</tr>
<tr>
<td>Heights of lift</td>
<td>As per customer applications</td>
</tr>
<tr>
<td>Class of duty/standards</td>
<td>M5, M7, M8 as per IS: 3177 / IS: 4137 / IS: 807 classification. Also available as per any other applicable international standards</td>
</tr>
<tr>
<td>Speeds</td>
<td>Selected depending on client specifications/applications/dimensions</td>
</tr>
<tr>
<td>Crane controls</td>
<td>From floor through pendant push buttons/open cabin/totally enclosed cabin (optional)/radio remote control (optional)</td>
</tr>
<tr>
<td>Drive systems</td>
<td>Single/twin drive through squirrel cage/slip ring induction motor through totally enclosed, oil immersed, helical gear box</td>
</tr>
<tr>
<td>Motors</td>
<td>Crane duty slip ring/squirrel cage induction motors for main hoisting, auxiliary hoisting, cross travel and long travel. Insulation class F, degree of protection IP55, ambient temperature 45°C, 150 starts/stops per hour, duty S4, CDF 40%, conforms to IS:325</td>
</tr>
<tr>
<td>Brakes</td>
<td>Electro hydraulic thrustors/disc brakes for all motions. DC/AC electro magnetic brakes or additional brakes can be provided on request</td>
</tr>
<tr>
<td>Power supply system</td>
<td>To hoist and cross travel through trailing cables or through drag chains. To crane through shrouded bus bars/trailing cable/MS angle bus bar/bare copper conductors (depending on customer’s choice and application)</td>
</tr>
</tbody>
</table>

Optimum adaptation to the building design

TYPE-1

TYPE-2
SKYLINE JIB CRANES, pillar and wall-mounted are versatile efficient and cost effective solution for moving material within an individual work station or for transferring materials from one work area to another, serving as auxiliary lifting devices under overhead cranes. With a wide range of sizes and designs, these cranes can be adapted to provide the optimum solution for the most varied requirements in terms of load capacity, swing range, outreach and features - even including cranes with two jibs.
Benefits & Features:
- Low jib deadweight and correspondingly large outreach and high load capacity
- Helps to cut setting up and idle times and reduce unnecessary waiting for an overhead crane
- Manual traverse to full 360 degrees motorized rotation
- Offers greatest potential under boom clearance because it can be installed closer to the ceiling

Technical Specifications:

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Safe working load</td>
<td>250 Kgs to 5 Tons</td>
</tr>
<tr>
<td>Spans</td>
<td>Up to 6 m</td>
</tr>
<tr>
<td>Heights of lift</td>
<td>As per customer application</td>
</tr>
<tr>
<td>Swing</td>
<td>360 Degrees</td>
</tr>
<tr>
<td>Class of duty/standards</td>
<td>Equivalent to M5 and M7 as per IS: 3177/IS: 807 standards</td>
</tr>
<tr>
<td>Speeds</td>
<td>Selected depending on client specifications/applications</td>
</tr>
<tr>
<td>Crane controls</td>
<td>From floor through pendant push buttons/radio remote control (optional)</td>
</tr>
<tr>
<td>Drive systems</td>
<td>Through squirrel cage induction motors with totally enclosed, oil immersed, helical gear box</td>
</tr>
<tr>
<td>Motors</td>
<td>Crane duty squirrel cage Induction motors for main hoisting, cross travel and swing. Insulation class F, degree of protection IP55, ambient temperature 45°C, 150 starts/stops per hour, duty S4, CDF 40%, conforms to IS:325</td>
</tr>
<tr>
<td>Brakes</td>
<td>Disc brakes for all motions. DC/AC electro magnetic brakes or additional brakes can be provided on request</td>
</tr>
<tr>
<td>Power supply system</td>
<td>To hoist and cross travel through trailing cables or drag chain</td>
</tr>
</tbody>
</table>
SKYLINE GANTRY CRANES are ideal for outdoor applications where lifting facilities are provided without the cost of a building or any supporting steelwork. They are also suited to indoor applications where existing building structures are not suitable to take overhead cranes. These can be constructed with a cantilever to allow handling outside the rail centers. Typical applications for this type of crane include steel stock yards, loading areas, concrete industry and ship building.
Benefits & Features

- Eliminate unnecessary movements and allow better utilization of the land
- Rigid and durable compact steel structure
- Plate box section as the crane girder
- Innovative realignable wheels ensure smooth gantry travel with minimum wear of the crane rails
- Trolley is designed for easy maintenance and the active load control system provides sway prevention

Technical Specifications:

<table>
<thead>
<tr>
<th>Safe working load</th>
<th>1 Ton to 100 Tons</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spans</td>
<td>6 m to more than 30 m</td>
</tr>
<tr>
<td>Heights of lift</td>
<td>As per customer applications</td>
</tr>
<tr>
<td>Class of duty/standards</td>
<td>Equivalent to M5, M7, M8 as per IS: 3177/IS: 4137/IS: 807 standards</td>
</tr>
<tr>
<td>Speeds</td>
<td>Selected depending on client specifications/applications</td>
</tr>
<tr>
<td>Crane controls</td>
<td>From floor through pendant push buttons/open cabin/totally enclosed cabin (optional)/radio remote control (optional)</td>
</tr>
<tr>
<td>Drive systems</td>
<td>Twin drive with squirrel cage/slip ring induction motors, through totally enclosed, oil immersed, helical gear box</td>
</tr>
<tr>
<td>Motors</td>
<td>Crane duty squirrel cage induction motors for main hoisting, auxiliary hoisting, cross travel and long travel. insulation class F, degree of protection IP55, ambient temperature 45°C, 150 starts/stops per hour, duty S4, CDF 40%, conforms to IS:325</td>
</tr>
<tr>
<td>Brakes</td>
<td>Electro hydraulic thrustors/disc brakes for all motions. DC/AC electro magnetic brakes or additional brakes can be provided on request</td>
</tr>
<tr>
<td>Power supply system</td>
<td>To hoist and cross travel through trailing cables or drag chain. To crane through cable reeling drum or any alternate system</td>
</tr>
</tbody>
</table>
SKYLINE GOODS LIFT is designed to offer the simplest, quickest, most reliable and economical solution to heavy lifting problems. We master the production of heavy duty lifts in a great variety of sizes and speeds. The lift range we offer is suitable for industrial sites dedicated to manufacturing and/or assembly or whatever other facilities involving the transport of freight.

Our large capacity lifts are much in demand, and are designed for the transportation of heavy goods up to several tons in weight, without accompanying personnel and are very robust and hard-wearing. These lifts are highly adaptable to specific environments and functions, and can be supplied corrosion resistant, specially reinforced and so on, as required.
**Benefits & Features**

- A notably wide range of rated load capacities and lift sizes.
- Robust and resistant lift cars for heavy goods handling.
- An ample choice of optional equipment to further improve lift' strength and durability: shock-resistant perimeter protection, rubber or chequered-plate flooring.
- Sturdy and hardwearing manual & automatic shutters & collapsible gates.

**Technical Specifications:**

<table>
<thead>
<tr>
<th>Specification</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Safe working load</td>
<td>250 Kgs to 5 Tons</td>
</tr>
<tr>
<td>Height of lift</td>
<td>As per customer applications</td>
</tr>
<tr>
<td>Class of duty/standards</td>
<td>Equivalent to M5, M7 and IS: 3177/IS: 807 standards</td>
</tr>
<tr>
<td>Speed</td>
<td>Selected depending on client specifications/applications</td>
</tr>
<tr>
<td>Lift controls</td>
<td>Pendant push button</td>
</tr>
<tr>
<td>Drive systems</td>
<td>Single drive with squirrel cage induction motors through totally enclosed, oil immersed gear box</td>
</tr>
<tr>
<td>Motors</td>
<td>Crane duty squirrel cage motors for main hoisting. Insulation class F, degree of protection IP55, ambient temperature 45°C, 150 starts/stops per hour, duty S4, CDF 40%, conforms to IS:325</td>
</tr>
<tr>
<td>Brakes</td>
<td>Electro hydraulic thrusters/disc brakes. DC/AC electro magnetic brakes or additional brakes can be provided on request</td>
</tr>
<tr>
<td>Power supply system</td>
<td>To lift through trailing cables</td>
</tr>
</tbody>
</table>

Call us @ +91 9770 446 446
SERVICES

Services

We at SKYLINE believe that key to a valued business relationship is ensuring that the equipment supplied by us is supported by an efficient and effective services program. We ensure minimum downtime for all our customers.

Our products are supported over the life span of the equipment with genuine spares and a variety of service programs to ensure the equipment remains operational at all times.

We also provide AMC services; to minimize the breakdown by carrying out planned preventive maintenance activities, regular inspection checks of critical components, consultancy in spare part stocking plans.
Easy to reach SKYLINE for all needs ........ one call is all that takes.

Maintenance Service

We offer you service around the clock. This ensures the highest availability and safety in your installation.

After Sales Service

We believe in providing Total Solutioneering from Custom Design to Installation Expertise to our Customers which rely on us from many years. We value for 100% satisfaction to our customers by providing Reliable, Durable, Competitive and Cost Efficient Solutions for Material Handling needs with Best Service Support (24x7x365).

Effective Training of Your Employees

SKYLINE engineers train your employees for all they need to know about hoists and crane installations. This increase productivity, familiarization with the relevant regulations contributes towards maximum safety at the work place.
The performance and safety status of your installation are kept under surveillance by our engineers. This enables any necessary maintenance and repair work to be identified and carried out in good time, downtime is reduced. Regular monitoring cuts maintenance and operating costs in the long term.
Your Individual Service Package

SKYLINE Service offers a comprehensive portfolio of services to ensure the lasting availability of your installation throughout its entire life cycle.
• Recurring inspections according to relevant accident prevention regulations.
• Inspection and maintenance according to contract schedules.
• Fault elimination both with and without an on-call standby agreement.
• Crane and crane runway surveys.
• Service training for operators and maintenance engineers.

On this basis, we can assemble a package tailored to meet your individual production and operating needs.

Spare Parts

SKYLINE maintains cranes of all makes and models. This expertise is available for you also for spare parts of any cranes.

With extensive knowledge of different cranes, SKYLINE can serve you with safe and easy to install parts in order to keep you cranes in safe condition, for example ropes, breaks, rope guides, motors and up-to-date electrical control systems.

You can benefit from local SKYLINE Service when ordering parts together with installation. SKYLINE will make sure you can operate your cranes safely and reliably.

Call us @ +91 9770 446 446