



## PRE-QUALIFICATION DOCUMENT

COMMITTED TO  
EXCELLENCE



“One of the  
LARGEST  
Manufacturers  
of Steel Buildings”

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COMPANY  
PROFILE





# COMPANY PROFILE



Introduction

Vision, Mission, and Values

Network

Customer Base

Trade license & Certifications

# KIRBY BUILDING SYSTEMS

Kirby Building Systems, established in 1976, is a global leader in the design and fabrication of pre-engineered steel buildings and structures, offering its customers a wide range of customized and cost-effective steel building solutions. Kirby's global spread extends across Middle East, Africa, Asia, Indian subcontinent and South East Asia with production capacity exceeding 610,000 MT annually, operations across 70 countries and workforce of more than 5,000 employees.

Kirby globally offers one of the most comprehensive product portfolio ranging from pre-engineered steel building, structural steel to storage solutions. We offer a wide range of steel solutions tailored to meet our customers' specific needs including pre-engineering steel buildings, storage solutions, industrial racking systems, and broad array of our steel building products that cover applications such as heavy industry, infrastructure, high-rise buildings, warehouse, factories, oil and gas and leisure structures.

## KIRBY SOUTH EAST ASIA

Kirby South East Asia is doing business since 1999 and started its operation in Vietnam in 2008, with a 50,000 MT annum capacity. Kirby South East Asia has supplied and built over 1500 buildings in Vietnam, Australia, Bangladesh, South East Asia and African markets.

Our commitment to excellence provides unmatched product quality, coupled with speed, safety and superior sales services.









# VISION

To be recognized as the global leader for the design, manufacture, supply and erection of Pre-Engineered Steel Buildings (PEB) and Structures

# MISSION

Kirby will achieve this vision by consistently delivering high-quality products to our customers, accompanied by personalized service and a commitment to excellence.

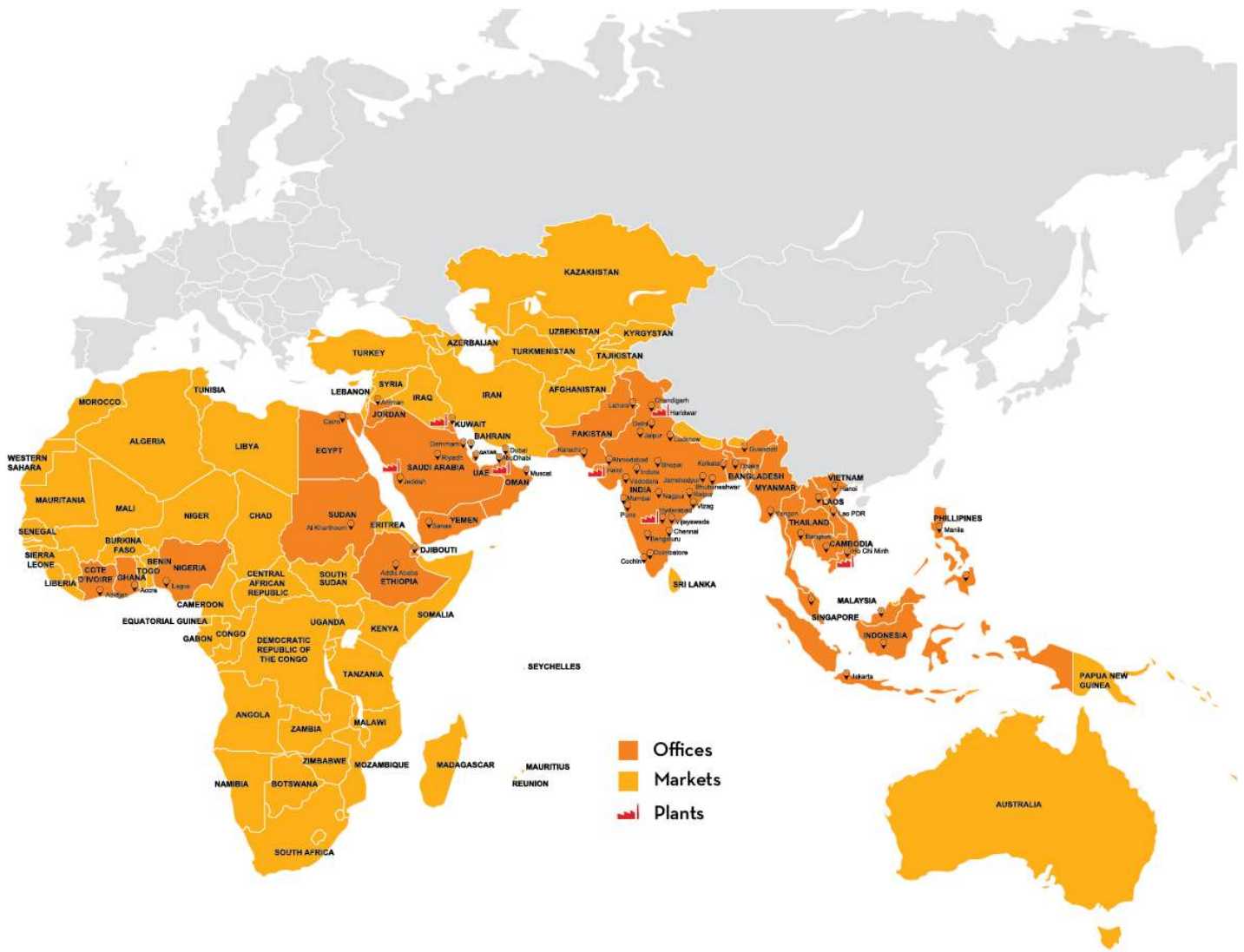




# VALUES

- **Straight-talking:** We encourage open debate where the best ideas win.
- **Customer centric:** We put our customers at the center of our focus and initiatives with the objective of providing them with unmatched levels of services and products
- **Teamwork:** We actively share information and ideas, enthusiastically working to make those around us better
- **Diversity and respect:** The diversity of our workforce is an asset and we treat everyone with dignity and respect regardless of status, gender, education, ethnicity or religion.
- **Empowerment:** We empower people to make decisions with a bias for action.
- **Employees as core assets:** We believe that our employees are our most valuable resource, and do whatever it takes for their continuous training, development and motivation.
- **Meritocracy:** The rewards and career advancements of our people are based on their performance and capabilities, not on their influence.





# NETWORK

## MANUFACTURING PLANTS

-  **Vietnam**
-  Dong Nai
-  **India**
-  Hyderabad
-  Haridwar
-  Halol Gujarat
-  **Kuwait**
-  Mina Abdullah
-  **UAE**
-  Ras Al-Khaimah
-  **SAUDI ARABIA**
-  Jeddah

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## KIRBY REGIONS

- Gulf Co-operative Countries (GCC)
- Middle East
- India
- Africa
- South East Asia
- Europe & CIS Countries

## KIRBY SEA SALES NETWORK

- Asia Pacific**
- Vietnam    Singapore    Myanmar
- Indonesia    Malaysia    Laos
- Thailand    Philippines    Cambodia
- South Asia & Oceania**
- Bangladesh    Australia
- Sri Lanka    New Zealand




# CUSTOMER BASE

Kirby SEA has designed, fabricated and supplied more than 1500 steel building to various customers across South East Asia, Africa, Oceania and Bangladesh. Some major customers include: Posco E&C, Panasonic, Hyundai, American Standard, Nestlé, Eurowindow, Shimizu, Meada, Nakano, Vinamilk, TH Milk, VinaCapital, Toyo, Fujita, Obayashi, Shimizu, Nishimatsu, Vinata, KC Metal, Channakorn M&R, Channakorn Engineering, Hemraj Industrial Park, C.P. Penna, Tricharoen, Kajima, Cofico, CotecCons, Thaco, Fuco Steel, SMC steel, Gemadept, Sumi, Delta, Rebel Steel, Nova Tech, Nepean group, Ananta Huxiang, S.S.L, MMI, KB Max, TKM and many more...



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# CERTIFICATIONS



**AMERICAN INSTITUTE OF STEEL CONSTRUCTION**  
**CERTIFICATION PROGRAMS**  
 PROUDLY RECOGNIZE THAT

**Kirby Southeast Asia Co., Ltd.**

MAINTAINS OPERATIONS LOCATED AT

Nhon Trach III Industrial Zone, Phase II  
 Nhon Trach, Dong Nai VNM

THAT SUCCESSFULLY MEET THE QUALITY CERTIFICATION REQUIREMENTS FOR

**Building Fabricator**

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PRESIDENT



CERTIFICATION NUMBER	ISSUED	VALID THROUGH
C-00023981	January 23, 2024	February 28, 2025

Certificate of AISC



**KIRBY SOUTHEAST ASIA CO., LTD**

ROAD NO. 8, NHON TRACH III INDUSTRIAL ZONE - PHASE II, LONG THO COMMUNE, NHON TRACH DISTRICT, DONG NAI PROVINCE, VIETNAM

Bureau Veritas Certification Holding SAS – UK Branch certifies that the Management System of the above organisation has been audited and found to be in accordance with the requirements of the management system standards detailed below

**ISO 9001:2015**

Scope of certification

**MANUFACTURE, SUPPLY AND INSTALLING OF PRE-ENGINEERING STEEL BUILDING**

Original Cycle Start Date: 03-05-2017

Expiry date of previous cycle: NA

Certification / Recertification Audit date: 13-04-2023

Certification / Recertification cycle start date: 13-04-2023

Subject to the continued satisfactory operation of the organization's Management System, this certificate expires on: 02-05-2026

Certificate No.: VN010335 Rev: 1 Issue date: 13-04-2023



**LUU THI MAI HUONG**

Certification Body Address: 8th Floor, 99 Prescott Street, London, E1 8HG, United Kingdom  
 Local Office: Unit 4/4A, 4th Floor, E-Town 1 Building, 384 Cong Hoa Street, Tan Binh District, Ho Chi Minh City, Vietnam



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**BUREAU VERITAS**

*To whom it may concern:*  
 The Executive Board of **KIRBY SOUTHEAST ASIA CO., LTD.**  
 With all distinguished members:

*It is our great honor to send a warm congratulation on your success in Operating, Maintaining, and Continuously Improving Quality Management Systems (QMS) to ISO 9001: 2015.*

*This achievement demonstrates your company's persistent and professional effort in meeting the strict requirements of international standards. There is always a sharp competition in market, which requires your company to focus on continuous system improvement activities.*

*Bureau Veritas Vietnam commits to accompany in your organization in all activities, providing industry best practice and knowledge of standards, legislation through seminars, webinar, training courses, etc.*

*We all on together move forward to the concise and effective Quality Management Systems (QMS) to ISO 9001: 2015!*

*Best regards!*  
 Certification Manager



**Luu Thi Mai Huong**

ISO 9001:2015



# CERTIFICATIONS



ISO 45001:2018 and ISO 14001:2015



EN ISO 3834 -2:2021

# CERTIFICATIONS

BUREAU VERITAS Certification	
<b>CERTIFICATE OF CONFORMITY OF THE FACTORY PRODUCTION CONTROL</b>	
Certificate number 1370-CPR-2317	
In accordance with Regulation 305/2011/EU of the European Parliament and of the Council of 9 March 2011 (Construction Products Regulation - CPR), this certificate applies to the construction product:	
PRODUCTS	STRUCTURAL COMPONENTS FOR STEEL
CHARACTERISTICS*	Execution Class: up to EXC 3 included CE Marking Method: 3a
placed on the market under the name or trade mark of:	
MANUFACTURER	KIRBY SOUTH EAST ASIA CO. Ltd HEAD OFFICE: 7 <sup>th</sup> Floor, Phuoc Thanh Building, 199 Dien Bien Phu Street Ward 15, Binh Thanh District 708300 Ho Chi Minh City - VIETNAM
and produced in the manufacturing plant:	
MANUFACTURING PLANT	Road No. 8, Nhon Trach 3 IP, Phase 2, Nhon Trach District, Dong Nai Province, VIETNAM
This certificate attests that all provisions concerning the assessment and verification of constancy of performance described in Annex ZA of the standard:	
EN 1090-1:2009 + A1:2011 - Execution of steel and aluminium structures	
under system 2+ are applied and that the factory production control is assessed to be in conformity with the applicable requirements.	
This certificate was first issued on 20-06-2023 and will remain valid as long as neither the harmonised standard, the construction product, the AVCP methods nor the manufacturing conditions in the plant are modified significantly, unless suspended or withdrawn by the notified factory production control certification body.	
*Technical specification for welding process in Annex 1/1	
Milan, 20-06-2023 Rev. 0	Technical Director Eng. Remo GODINO
Bureau Veritas Italia S.p.A. - Notified Body n° 1370 Viale Monza, 347 - 20126 Milan - ITALY	

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EN 1090



# ORGANIZATION & PEOPLE







# ORGANIZATION & PEOPLE



Executive Team

Organization Chart

Manpower

Representative Offices



**S. Krishnakumar**  
General Director  
(Kirby Southeast Asia)

**Krishnakumar** brings to Alghanim Industries 30 years of experience in the Industrial sector, during which he developed his expertise across multiple functions including business strategy, sales, manufacturing, engineering and project management. He was the Chief Executive - Steel Building Solutions at Everest Industries Limited, as well as the Head of International Business & Marketing at L&T Heavy Engineering. Most recently, Krishnakumar was the Chief Executive Officer at Indiana Gratings Private Limited, India. He holds a bachelor's degree in mechanical engineering from University of Mumbai, India, and an Executive MBA from SP Jain Institute of Management & Research, India.



**Raj Sekhar**  
Head of Engineer  
(Kirby Southeast Asia)

**Raj** has over 25 years of experience in the field of pre-engineered steel building systems, during his tenure with Kirby he has held various positions of increasing responsibilities in Kuwait, India, UAE and Vietnam. He is a post graduate Structural engineer from IIT Madras.

He has in depth knowledge about the various international codes, engineering systems and pricing strategies. He was personally involved in the design of several complex and high volume projects in Kuwait, India and Vietnam.





**Shamimul Islam**  
Head of Sales & Marketing  
(Kirby Southeast Asia)

**Shamimul Islam** is the Head of Sales for Kirby Southeast Asia. He is responsible for the Southeast Asia & Oceania Region with an objective to increase business revenue and also responsible for P&L. Has more than 17 years of experience in Structural Steel and PEB, project & site management. A Civil Engineering with vast experience in handling big volume projects in Indian Sub-continent and overseas markets. In his previous stints developed different functions across the board and implemented systems for smooth workflows. Focuses on talent development and team empowerment to always keep customer's interest at the forefront.



**Le Dinh Hao**  
Head of Factory  
(Kirby Southeast Asia - Vietnam)

**Le Dinh Hao** is an experienced Ship Building Engineer with over 22 years of expertise in Steel Structural, FEB Fabrication, and Ship Building. He began his career with Hyundai Vinashin Shipyard in 2001 and has since worked with various companies, including Triyards and Zamil Steel, handling complex projects with high-quality requirements. His experience extends to power plants, pipe racks, conveyors, and other industrial products. He has demonstrated strong leadership, managing teams and operations effectively. Currently, he leads the manufacturing operation at Kirby SEA, leveraging his international industrial code knowledge to launch and manage projects to professional standards.

# EXECUTIVE TEAM





**Tran Van An Son**  
Head of Project  
(Kirby Southeast Asia)

**Tran Van An Son**, Steel structure project management expert with more than 20 years of experience, has worked at many leading steel structure companies in the world before joining Kirby Southeast Asia in 2007. Rich in management experience and accompanying Kirby SEA since the first years, he and his team have laid a solid foundation for a project management team that brings the highest efficiency and quality.



**Nikhil Saraf**  
Head of Finance  
(Kirby Southeast Asia)

**Nikhil Saraf** Nikhil holds CA and GARP certificates. He brings over 10 years of experiences to Kirby, with expertise in fields of Accounting and Finance.





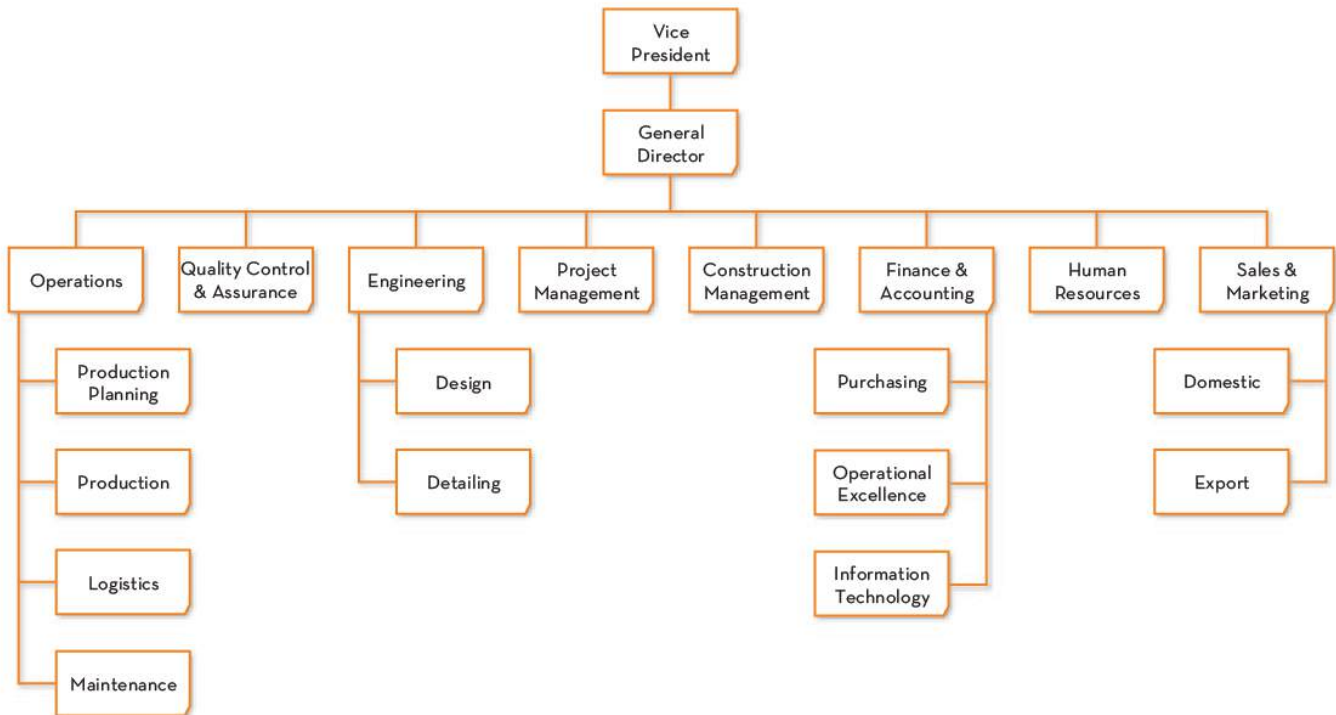
**Vu Ngoc Bich**  
Head of Human Resources  
(Kirby Southeast Asia)

**Vu Ngoc Bich** has a bachelor's degree in English from Ho Chi Minh City Open University and has 12 years of experience in Human Resources Management positions including recruitment, C&B, HRBP and Administrator. Before joining us, she worked at MNCs such as Schneider Electric, Bayer, Dow Chemical, Adecco...

# EXECUTIVE TEAM



# ORGANIZATION CHART



# MANPOWER

No. of Management Personal	10	No. of management personal with MBA Degree	10
No. of Engineers	100	No. of Engineers with University Degree (include IWS, BGAS-CSWIP and NDT Inspectors)	100
No. of Sales Staff	33	No. of Sales Staff with English and National language Ability	20
Workers	300	Certified Welders issued by Bureau Veritas	18
<b>Total</b>	<b>443</b>		

# OUR SALES NETWORK

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## For Kirby Southeast Asia

- **HO CHI MINH, VIETNAM** (Head Office)  
**Address:** 7th Floor, Phuoc Thanh Building, 199 Dien Bien Phu Str., Ward 15, Binh Thanh District, Ho Chi Minh City, Vietnam  
**Telephone:** (+84) 28 5422 1155      **Email:** sales@kirby.vn
- **MALAYSIA & SINGAPORE**  
**Malaysia:** 5029b, Jalan Kenari 1, Bandar Putra, 81000 Kulai, Johor, Malaysia  
**Singapore:** 3, Church Street, #25-01, Samsung Hub, Singapore – 049483  
**Mr. Praveen Kumar - Area Sales Manager**  
**Mobile phone:** (+65) 9759 8170      **Email:** praveen.kumar@kirby.vn
- **YANGON, MYANMAR**  
**Address:** C-203, Aung Chan Thar Housing, East Shwe Gon Daing Road, Bahan Township, Yangon, Myanmar  
**Mr. Zar Ni Tun - Myanmar Sales Manager**  
**Mobile phone:** (+95) 92 5008 0628      **Email:** zarnitun@kirby.vn
- **MANILA, PHILIPPINES/ FIJI/ PAPUA NEW GUINEA**  
**Manila:** Unit 1506, Jollibee Centre Building, San Miguel Avenue, Ortigas Center, Pasig City, Metro Manila, Philippines  
**Mr. Sanjiv Ojha - Philippines Sales Manager**  
**Mobile phone:** (+63) 917 636 9772      **Email:** sanjiv.ojha@kirby.vn
- **DAVAO, PHILIPPINES**  
**Address:** Unit 316, Pink Walters Building, Sandawa, Ecoland, Davao City  
**Mr. Anthony Flora D. Flora - Sales Engineer**  
**Mobile phone:** (+63) 917 186 3347      **Email:** anthony.flora@kirby.vn
- **JAKARTA & KALIMANTAN, INDONESIA**  
**Address:** B-21, Ruko Grand Orchard, Jalan Terusan Kelapa Hybrida, Kelapa Gading, Jakarta - 14140  
**Mr. Saurabh Pratap Upadhyay - Indonesia Sales Manager**  
**Mobile phone:** (+62) 811 8705 002      **Email:** saurabhpratap.u@kirby.vn
- **BANGKOK, THAILAND**  
**Address:** 50/1 Channakorn Engineering Tower 9th floor, Ngamwongwan Road, Ladyao, Chatuchack, Bangkok 10900, Thailand  
**Mr. Nguyen Ngoc Vinh - Thailand Sales Manager**  
**Mobile phone:** (+66) 61 991 8896      **Email:** ngocvinh.nguyen@kirby.vn
- **VIENTIANE, LAOS**  
**Address:** No 141 at Ban Dongpalanthong, Sisattanak Dist, Vientiane Capital, Lao PDR.  
**Mr. Tananut Hinlad - Sales Engineer**  
**Mobile phone:** (+66) 82 818 3569      **Email:** tananut.hinlad@kirby.vn
- **CAMBODIA & AUSTRALIA**  
**Email:** sales@kirby.vn
- **BANGLADESH & SRI LANKA**  
**Email:** sales@kirby.vn







# ENGINEERING EXPERTISE



Engineering Center of Excellence

Design and Detailing

Applicable Design Code

Material Specifications



## ENGINEERING CENTER OF EXCELLENCE

Kirby Building Systems' Engineering Center of Excellence is a world-class Research and Development facility to enhance the company's expertise for its wide range of customized and innovative products – Pre-Engineered Steel Buildings, Structural Steel and Storage Solutions. The center provides leadership, best practices, research, support and training in focused areas to revitalize the existing products and also develop new expertise in steel. The center addresses the significant engineering challenges associated with designing these structures to help the world develop sustainable innovations. All the buildings are custom designed using the latest domestic / international codes and standards such as MBMA, AISC, AISI, IS and AWS which are most optimized & economical in nature able to meet all the customer needs. The design and detailing process is carried out using sophisticated software packages.

The centre of excellence, located in India, consists of more than 500 highly experienced structural engineers with industry domain knowledge to cater to the company's various requirements across the globe. This team ensures that all the customers receive the best of the product with very high value and minimal risk and maximize the return on investment to derive most of the benefits in each and every step of the project.

## DESIGN & DETAILING

The engineering department uses the latest versions of internationally renowned industry standard 3D and 2D software for designing and detailing. Kirby upholds its position at the cutting edge of the industry due to its commitment to quality and customer satisfaction. Skilled structural engineers using the very latest in computerized engineering design and detailing systems that permit the selection of the most economical, accurate and efficient framing and cladding systems. The Engineering Department is fully computerized, utilizing the latest software packages to enable them to produce the most economical structures in the shortest time possible. The software packages most frequently used are:

Pakage	Description	Specifications/ Code
<b>STAAD.Pro</b>	Hot-Rolled & Built-up Sections	BS 5950 A.I.S.C
<b>PROKON</b>	Design of steel connections and column base plates	BS 5950
Kirby Building Systems Kuwait Co. <b>MATRIX</b>	Design of Built-up Sections	A.I.S.C
<b>SmartEST</b>	Design and Estimating	A.I.S.C
<b>ETABS</b>	Multi-story building analysis and design	A.I.S.C

# ENGINEERING EXPERTISE

The Drafting office is also fully computerized and uses the following main software packages:

Pak age	Description
	Preparation of GA Drawings & Fabrication Drawings – Miscellaneous Wor
	3D Modeling – Detailing of Connections, curved structures and angle tow Automatic Generation of Fabrication Drawings, Production & Material Lis
	3D Modeling – Detailing of Connections – Automatic Generation of Fabricts – Drawings, Production & Material Listings
	Manage detailing, fabrication and erection of steel structures

## APPLICABLE DESIGN CODE

- Specification for Structural Steel Buildings, American Institute of Steel Construction, North American Specification for the Design of Cold-Formed Steel Structural Members – AISC March 9, 2005 Latest Edition (ANSI/AISC 360-05) for Working Stress and AISC 360-10 for Limit State Design.
- American Iron and Steel Institute, AISI 2007 Latest Edition and NAUS 2007
- Metal Building Systems Manual, Metal Building Manufacturers Association, MBMA 2010 latest Edition.
- Minimum Design Loads for Buildings & other Structures, ASCE/SEI 7-10 latest Edition
- International Building Code 2012 (IBC 2012) latest Edition.
- Structural Welding Code-Steel, American Welding Society, AWS D1.1/D1.1M-2008 latest Edition.
- Euro Codes/BS

## MATERIAL SPECIFICATIONS

All materials conform to the following specifications or equivalent

1. Built-Up Sections: ASTM A 572 Gr 50 ( $F_y = 50$  Ksi)
2. Hot-Rolled Sections: ASTM A 572 Gr 50 ( $F_y = 50$  Ksi)
3. Rod-Bracing: ASTM A 36 ( $F_y = 36$  Ksi)
4. Tubes: SHS ASTM A 500 Gr 'C' ( $F_y = 48$  Ksi) / CHS ASTM A 53 GrB ( $F_y = 36$  Ksi)
5. Cold-Formed Sections: ASTM A 1011/A607 ( $F_y = 65$  Ksi)
6. Roof & Wall Sheeting: ASTM A 792 Gr 50 ( $F_y = 50$  Ksi)
7. High Strength Bolts: ASTM A 325 ( $F_y = 95.6$  Ksi)
8. Anchor Bolts/Rod-Bracing: ASTM A 36 ( $F_y = 36$  Ksi)









# MANUFACTURING FACILITIES

Global Plants

List of Machineries

Fabrication Process Flow Chart



# MANUFACTURING FACILITIES

## GLOBAL PLANTS

Kirby Building Systems is the first company to introduce Pre-Engineered Steel Buildings technology in Middle East region in 1976 and later in India in 1999. We are proud to say that we have delivered the World's largest Pre-Engineered Steel Building something that shows the edge we have over our competition. All our manufacturing facilities are ISO 9001 certified. Kirby has commissioned its PEB construction plant in 2008 in Vietnam to cater to the South East Asia region.



**VIETNAM - DONG NAI PLANT**



50,000 MT

**INDIA - HALOL GUJRAT PLANT**



50,000 MT

**INDIA - HYDERABAD PLANT**



100,000 MT



# MANUFACTURING FACILITIES

INDIA - HARIDWAR PLANT



SAUDI ARABIA - JEDDAH PLANT



KUWAIT - KUWAIT PLANT



UAE - RAS AL-KHAIMAH PLANT





## LIST OF MACHINERIES

No.	Equipment
<b>H Beam line</b>	
1	16 mm Hydraulic Shear
2	25 mm Shear
3	CNC Multi Torch with Plasma
4	Power Press 200 Tons
5	Radial Drilling M/Cs with Coolant Pump & work light
6	Flange Line
7	Grinder
8	Vacuum Lifters
9	Flange Stacker Crane-3 T
10	Vacuum Lifters
11	Jib Cranes for Conrac
12	Crane-10 T
13	Crane-5 T
14	Jib Crane - 2 T
15	Automatic CNC Punching M/c for Flange Line
16	H-Beam Welder with Seam Welder & Infeed/Output Conveyors (1200mm)
17	H-Beam Welder with Seam Welder & Infeed/Output Conveyors (1800mm)
18	Flux Drying Oven
19	LT -7 Submerged Arc Welder
20	MIG Welding M/c

# MANUFACTURING FACILITIES

21	Arc Welding M/c
22	Shot Blasting M/c
23	Pneumatic Grinders
24	Gas Cutting Equipment
25	Airless Spraying equipment
26	Hand Pallets & Material Handling Equipment
27	Nitto Broach Cutter
28	Nitto Punching M/c
<b>C&amp;F Line</b>	
29	Z-Line
30	C&E Line
31	Crane-5 T
32	Snap lock M/C
33	Angle Forming Line with Power pack
34	13mm Shearing M/c
35	Iron Worker
36	60 T Press
37	110 T Press
38	45 T Press
39	K R Profile Roll Former
40	Standing Seam Roll Former
41	Deck Panel Line

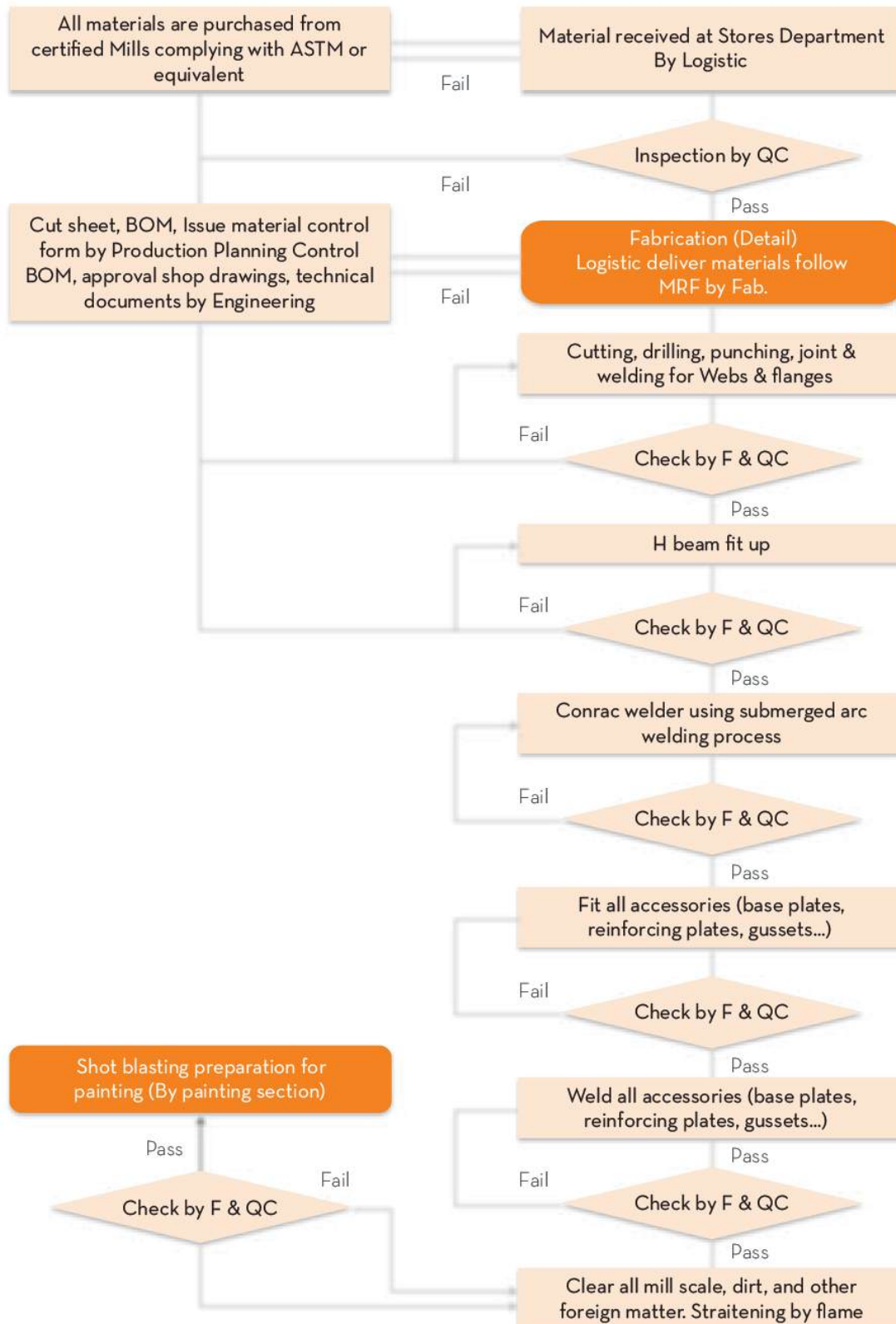


## LIST OF MACHINERIES (CONT.)

No.	Equipment
42	Downspout Line
43	Press Brake
44	Hemming M/c
45	CTL / Slitter
46	Curved Panel Press
47	45 T Small Press Brake
48	Hydraulic Bending M/c(Folding M/C)
<b>Workshop Equipment</b>	
49	Milling M/C f
50	Lathe M/c
51	Surface Grinder M/c
52	Pillar Drilling M/C
53	Grinder
<b>Factory Utility</b>	
54	Generator ( 500 KVA , 721.6 A )
55	Air compressor ( 125 HP , 94 KW )
56	Air dryer ( 4 HP , 8 A )
57	UPS backup system ( 24 KWh , 220V AC )
58	Fork Lift - 5 Tons
59	Fork Lift - 3 Tons
60	Weighbridge
61	Gantry

# MANUFACTURING FACILITIES

## FABRICATION PROCESS FLOW CHART











# QUALITY CONTROL

Quality Control Procedure

List of Testing Equipment



# QUALITY CONTROL PROCEDURE

Description	Characteristic	Type of check	Extent of check	Specifications & Acceptance Standards	Inspection	
					By Kirby	By Client
1.0 RAW MATERIALS						
1.1 Steel plates	a. Chemical & physical	a. Mill T.C. verification	a. 100%	a. ASTM A572 Gr50 (or equivalent)	R	R
	b. Mechanical testing	b. Lab test	b. 1 out of 10 heats	b. ASTM A572 Gr50 (or equivalent)	W	R
	c. Dimension	c. Measurement (Thickness, length & width)	c. Min. 1 piece in a lot.	c. ASTM A6	I	R
	d. Condition of material	d. Visual inspection	d. Min. 1 piece in a lot	d. Should not be rusted and pitted	I	R
2 Hot rolled sections Beam, Channel, Angle) (I-beam)	a. Chemical & physical	a. Mill T.C. verification	a. 100%	a. ASTM A572 Gr50 (or equivalent)	R	R
	b. Mechanical testing	b. Lab test	b. 1 piece out of every lot.	b. ASTM A572 Gr50 (or equivalent)	W	R
	c. Dimension	c. Measurement as per purchase order	c. Min. 1 piece in a lot.	c. ASTM A6	I	R
	d. Condition of material	d. Visual inspection	d. Min. 1 piece in a lot	d. Should not be rusted and pitted	I	R
3 Round bars (Anchor bolt, sag rod, brace rod)	a. Chemical & physical properties	a. Mill T.C. verification	a. 100%	a. JIS G3101 SS400 (or equivalent)	R	R
	b. Mechanical testing (only for anchor bolt)	b. Lab test	b. 1 piece out of every lot.	b. JIS G3101 SS400 (or equivalent)	W	R
	c. Dimension	c. Measurement as per purchase order	c. Min. 1 piece in a lot.	c. Kirby technical standards	I	R
	d. Condition of material	d. Visual inspection	d. Min. 1 piece in a lot	d. Should not be rusted and pitted	I	R
4 Pre-painted/ Galvalume sheeting coils (For roof, wall panels & flashings...)	a. Chemical & physical properties	a. Mill T.C. verification	a. 100%	a. ASTM A792M Gr340 (or Equivalent)	R	R
	b. Mechanical testing	b. Lab test	b. 1 piece out of every lot.	b. ASTM A792M Gr340 (or Equivalent)	W	R
	c. Dimension	c. Measurement (thickness & width)	c. Min. 1 coil in a lot.	c. ASTM A924M	I	R
	d. Condition of material	d. Visual inspection	d. Min. 1 coil in a lot	d. Should be free from black spot , scratch & rust	I	R
1.5 Pre-Galvanized sheeting coils (for purlin, girt, eave strut)	a. Chemical & physical properties	a. Mill T.C. verification	a. 100%	a. ASTM A653M Gr340 (or equivalent)	R	R
	b. Mechanical testing	b. Lab test	b. 1 piece out of every lot.	b. ASTM A653M Gr340 (or equivalent)	W	R
	c. Dimension	c. Measurement (thickness & width)	c. Min. 1 coil in a lot.	c. ASTM A924M	I	R
	d. Condition of material	d. Visual inspection	d. Min. 1 coil in a lot	d. Should be free from black spot, scratch & rust	I	R

# QUALITY CONTROL PROCEDURE

<b>1.6</b> Square hollow sections	a. Chemical & physical properties	a. Mill T.C. Verification	a. 100%	a. ASTM A500 Gr50 (or Equivalent)	R	R
	b. Mechanical Testing	b. Lab Test	b. 1 piece out of every lot.	b. ASTM A500 Gr50 (or Equivalent)	W	R
	c. Dimension	c. Measurement	c. Min. 1 piece in a lot.	c. ASTM A500 Gr50 (or Equivalent)	I	R
	d. Condition of Material	d. Visual Inspection	d. Min. 1 piece in a lot.	d. Should not be rusted and pitted	I	R
<b>2.0 BOUGHT-OUT ITEMS</b>						
<b>2.1</b> Insulations	a. Density & dimension	a. T.C. verification	a. Min.1 piece in a lot	a. BOM	I	R
	b. Condition of material	b. Visual inspection	b. Min.1 piece in a lot	b. Should not be damaged	I	R
<b>2.2</b> HS Bolts/ Nuts/ Washers	a. Chemical & physical properties	a. Mill T.C. verification	a. 100%	a. ASTM A325M/ A563M/ F436M	R	R
	b. Mechanical Testing	b. Lab Test	b. 1 sets in a lot & max 5 sets	b. ASTM F606M/ A370M	W	R
	c. Dimension	c. Measurement	c. Min. 1 set in a lot	c. ANSI B18.2.3.7M/ B12.4.6M/ ASTM F436M	I	R
	d. Condition of Material	d. Visual Inspection	d. Min. 1 set in a lot	d. Should not be rusted and pitted	I	R
<b>2.3</b> MS Bolts/ Nuts/ Washers	a. Chemical & physical properties	a. Mill T.C. verification	a. 100%	a. ASTM A307M/ A563M/F436M	R	R
	b. Mechanical testing	b. Lab test	b. 1 sets in a lot & max 5 sets	b. ASTM F606M/ A370M	W	R
	c. Dimension	c. Measurement	c. Min. 1 set in a lot	c. ANSI B18.2.3.5M/ B12.4.1M/ B18.22	I	R
	d. Condition of material	d. Visual inspection	d. Min. 1 set in a lot	d. Should not be rusted and pitted	I	R
<b>2.4</b> Roll-up/ Sliding Doors	a. Dimension	a. Measurement	a. 100%	a. Drawing, BOM	I	R
	b. Condition of material	b. Visual inspection	b. Min.1 piece in a lot	b. Should not be rusted and damaged	I	R
<b>2.5</b> Windows	a. Dimension	a. Measurement	a. 100%	a. Drawing, BOM	I	R
	b. Condition of material	b. Visual inspection	b. Min.1 piece in a lot	b. Should not be rusted and damaged	I	R
<b>2.6</b> Louvers	a. Dimension	a. Measurement	a. 100%	a. Drawing, BOM	I	R
	b. Condition of material	b. Visual inspection	b. Min.1 piece in a lot	b. Should not be rusted and damaged	I	R
<b>2.7</b> Ridge ventilator parts	Dimension	Measurement	100%	Drawing	I	R
<b>2.8</b> Paint	Chemical & physical prop./ Specifications	Mill T.C./ Data Sheet verification	100%	Job Spec.	R	R



## QUALITY CONTROL PROCEDURE (CONT.)

Description	Characteristic	Type of check	Extent of check	Specifications & Acceptance Standards	Inspection	
					By Kirby	By Client
<b>2.9</b> Welding Consumables	Chemical composition/ Mechanical properties	Test Certification verification	100%	AWS A5.1/5.17/5.20 Supplier's Spec.	R	R
<b>3.0 IN-PROCESS</b>						
<b>3.1</b> Welding qualification	a. WPS b. PQR c. WPQ	a. Verification b. Verification c. Verification	a. 100% b. 100% c. 100%	a. AWS D1.1 b. AWS D1.1 c. AWS D1.1	V V V	R R R
<b>3.2 Fabrication Process for Built up beams</b>						
<b>3.2.1</b> Cutting/ Shearing/ Drilling	Dimension	Measurement	Patrol inspection	Drawing/MBMA	I	--
<b>3.2.2</b> Flange to Flangetit-up & welding	Dimension	Measurement	Patrol inspection	AWS D1.1	I	--
<b>3.2.3</b> Web to web fit-up and welding	Dimension	Measurement	Patrol inspection	AWS D1.1	I	--
<b>3.2.4</b> a. Flange to web fit up b. Flange to web welding	a. Dimension b. Welding	a. Measurement b. Visual inspection	a. Patrol inspection b. Patrol inspection	a. Drawing/MBMA b. AWS D1.1	I I	-- --
<b>3.2.5</b> Fit up of base/ Splice plates and parts	Dimension	Measurement	100%	Drawing/MBMA	I	R
<b>3.2.6</b> Full Welding	Free from weld defects	Visual inspection	100%	AWS D1.1	I	R
<b>3.2.7</b> Non Destructive Examination on welds	a. Fillet Welds b. Butt Welds (Thickness >= 8mm)	a. MPT b. UT	a. 2% Min. b. 5% Min.	a. AWS D1.1 b. AWS D1.1	I I	R R

## QUALITY CONTROL PROCEDURE (CONT.)

<b>3.2.8</b> Final Inspection	Dimension	Measurement	100%	Drawing/MBMA	I	R
<b>3.2.9</b> Surface Preparation and Painting	a. Surface Cleaning b. Dry-Film Thickness c. Quality of Coating	a. Visual Inspection b. Measurement c. Visual Inspection	10% Min. 10% Min. 10% Min.	SSPC/ Job Spec. SSPC/ Job Spec. SSPC/ Job Spec.	I I I	R R R
<b>3.3</b> Cold Forming process for Purlin C, Z & Angle L	Dimension	Measurement	Patrol inspection	Drawing	I	R
<b>3.4</b> Sheeting Forming Process	a. Dimensional b. Free from scratch, dent etc.	a. Measurement b. Visual Inspection	Patrol inspection	Drawing	I	R
<b>3.5</b> Shipping Inspection	Free from damage, distortion, un-painted areas, and visual defects.	Visual Inspection	Patrol inspection	As per Packing List	I	--

### LEGEND

I : Inspection

R : Review

W : Witness

V : Verification

MPT : Magnetic Particle Testing

UT : Ultrasonic Testing

QCM : Quality Control Manual

WPQ : Welder / Welding Operator Performance Qualification

WPS : Welding Procedure Specification

PQR : Procedure Qualification Record

LOT : Qty send by Supplier against 01 Mill TC.



# LIST OF TESTING EQUIPMENT

No.	Name of Equipment	Quantity
<b>DIMENSION TESTING EQUIPMENT</b>		
1	Vernier Caliper/ Length 200, 300mm/ Acc 0.05	4
2	Digital Caliper/Length 300mm/Acc 0.01	1
3	Outside Micrometer/Range 0-25mm, 25- 50mm/Acc 0.01	2
4	Measuring Tape/Length 8m	4
5	Convex Ruler/Length 20m, 30m, 50m	5
6	Straight Steel Ruler/Length 150mm, 1m	6
7	Square Ruler/Size 200x300, 250x500	4
8	Universal Bevel Protractor/Length 300mm/Angle 0~90	1
9	Combination Square Sets/Length 300mm	1
10	Feeler Gage Set/Range 0.5 ~ 1mm/(20pcs)	2
11	Metric Taper Gage/Size 1mm ~ 15mm	4
12	Thread & Pitch Gage/21 Pcs	2
13	Thread Gage/30 Pcs	2
<b>WELDING TESTING EQUIPMENT</b>		
14	Welding Gage	1
15	Temperature Indicator/Non-Contact Thermometer	1
16	Ultrasonic Testing Machine/Epoch LTC	1
17	Magnetic Partical Testing Machine Type B-300S	1
<b>PAINTING TESTING EQUIPMENT</b>		
18	Dewmeter/Humid 20% ~ 99% / Temp. 0°C ~ 50°C	1
19	Surface Thermometer	1
20	Surface Roughness Comparator Chart for Grit	1
21	Testex Replica Tape	1

## LIST OF TESTING EQUIPMENT

22	Foil Thickness Gage	1
23	Wet Film Thickness Gage	1
24	Dry Film Thickness Gage	2
25	Cross Hatch Test	2
26	Tensile Adhesion Tester & Acc. & Epoxy	1
27	Conical Mandrel Test Apparatus	1
28	Bresle Salt Kit and Patches	1
29	Dust Tape Test Kit	1
30	Surface Roughness Tester (Model: TR200)	1
<b>MATERIAL TESTING EQUIPMENT &amp; OTHERS</b>		
31	Universal Testing Machine (Model:TUE-C-400)	1
32	Rockwell Hardness Tester (Model: MRS)	1
33	AC/DC Clamp Meter/Kyoritsu Type 2003A	1
34	Contamination Checking Kit	1
35	Precision Scale 210g	1
36	Microscope	1



# TESTING EQUIPMENTS



Dry Film Thickness Gage



Cross Hatch Test



Universal Testing Machine



Precision Scale



Microscope



Outside Micrometer



Magnetic Particle Testing Machine



Digital Caliper



Conical Mandrel Test



AC/DC Clamp Meter



Wet Film Thickness Gage



Foil Thickness Gage

# TESTING EQUIPMENTS



Surface Thermometer



Temperature Indicator



Ultrasonic Testing Machine



Combination Square Sets



Universal Bevel Protractor



Rockwell Hardness Tester



Dust Tape Test Kit



Bresle Salt Test Kit



Tensile Adhesion Tester

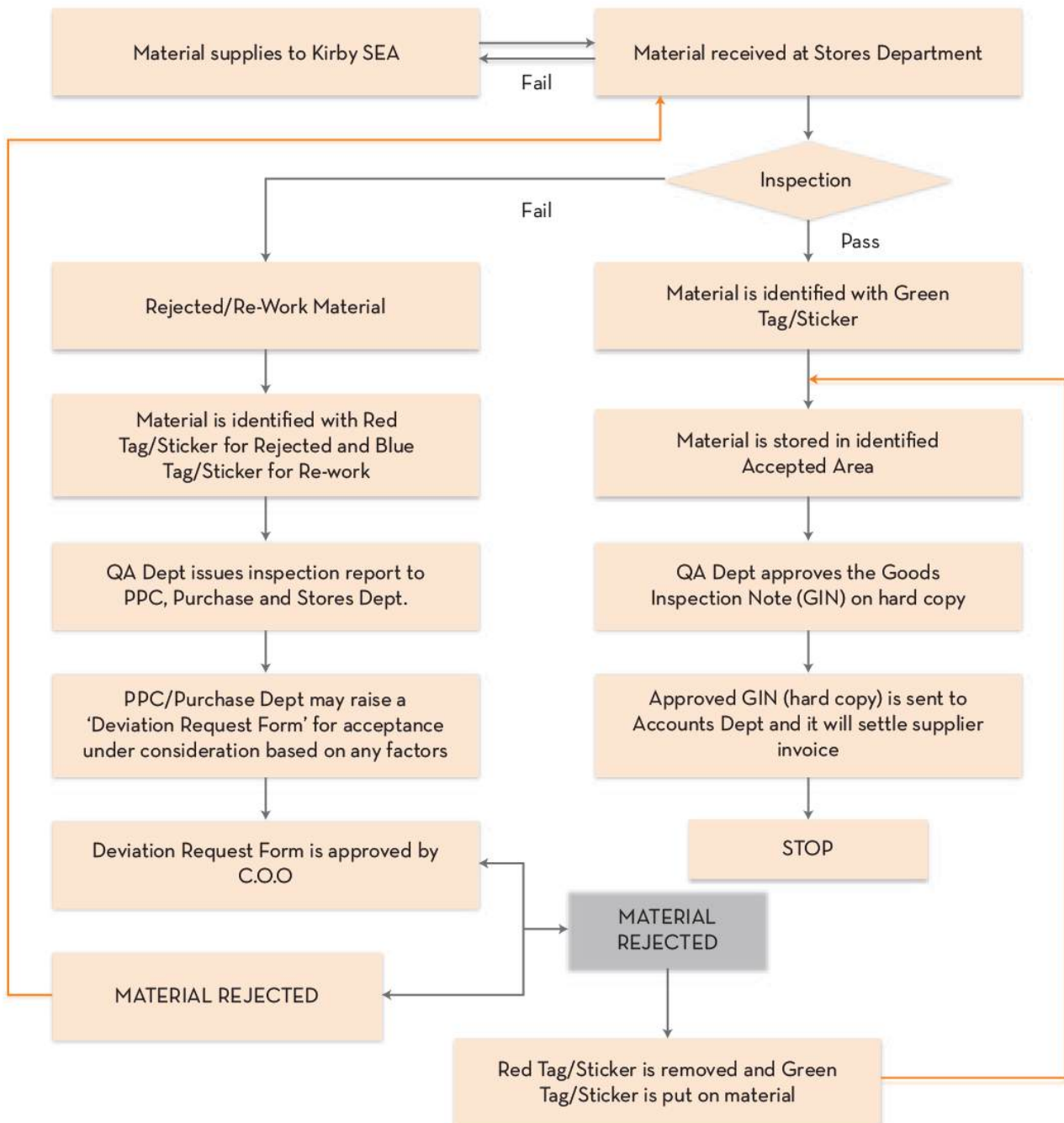


Dewmeter/Humid 20% ~ 99% / Temp. 0°C ~ 50°C



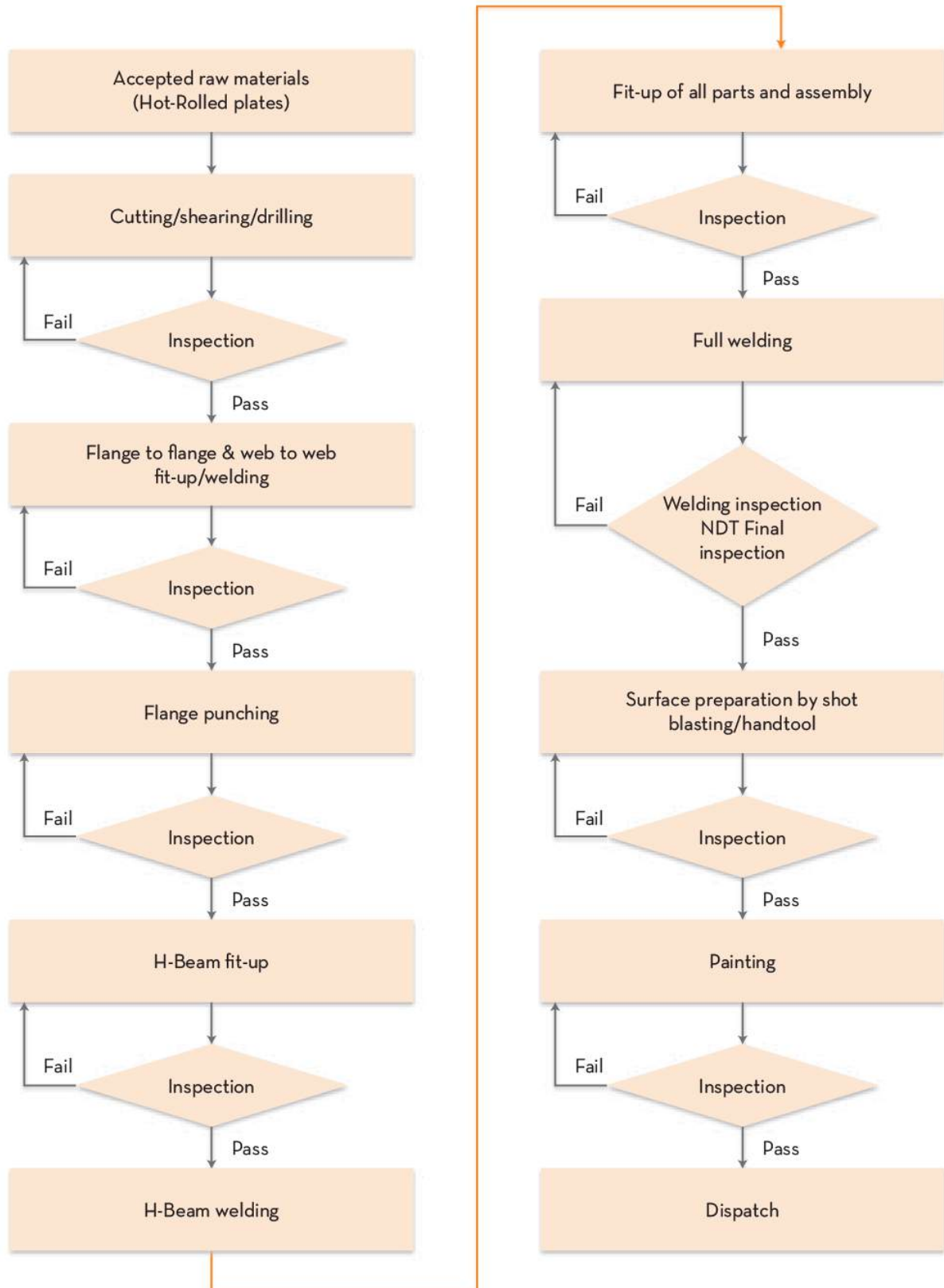
# QUALITY CONTROL FLOW CHART

## Material control flow chart



# QUALITY CONTROL FLOW CHART

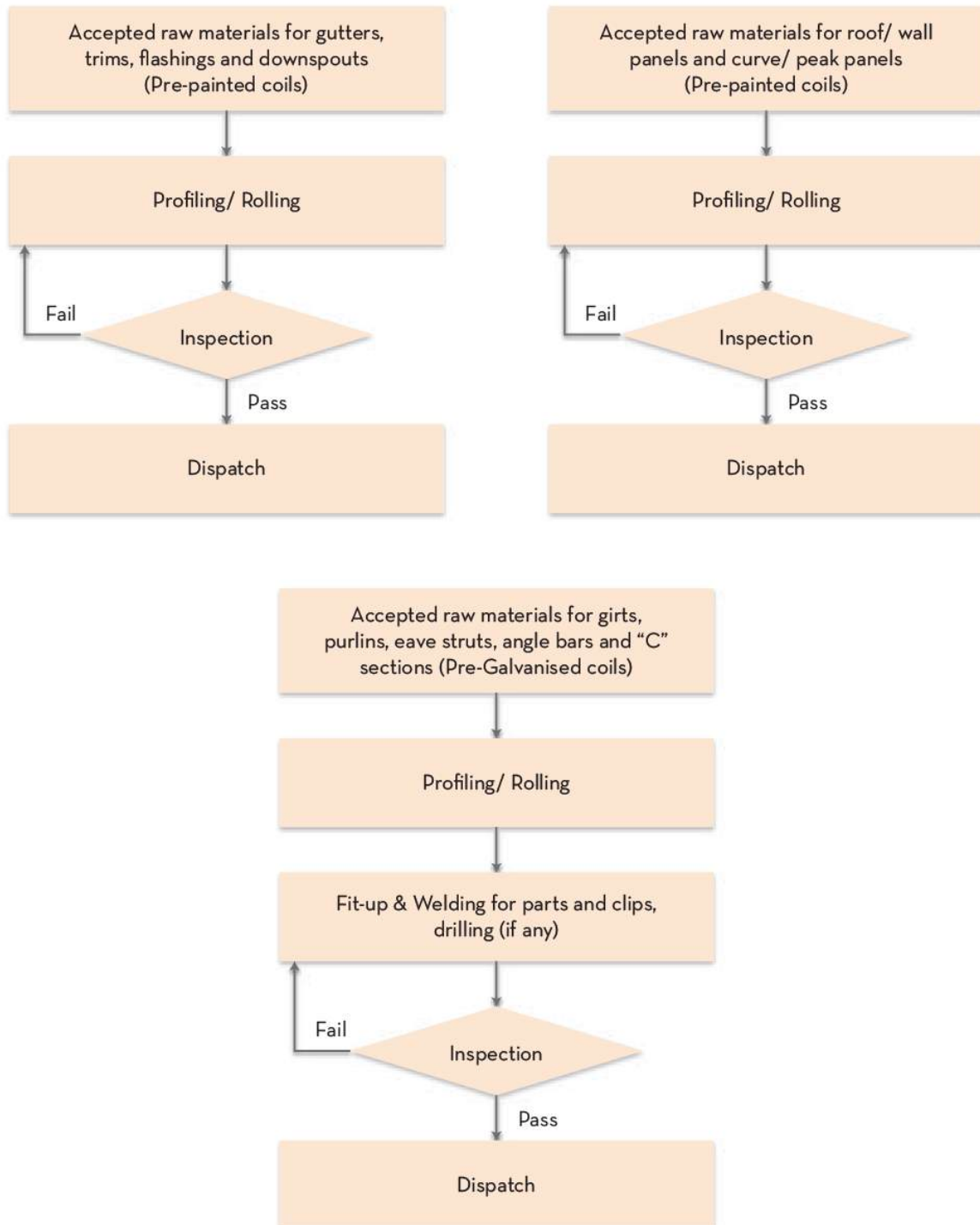
## H-Beam Lines Control flow chart





## QUALITY CONTROL FLOW CHART (Cont.)

### Cold Form & Sheetmetal lines



# QUALITY ACTIVITIES

## Raw Material Checking



## Assembly checking



## Drilling and cutting checking





# QUALITY ACTIVITIES

## Non-destructive testing



## Welding and NDT checking



# QUALITY ACTIVITIES

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Painting checking



Final checking









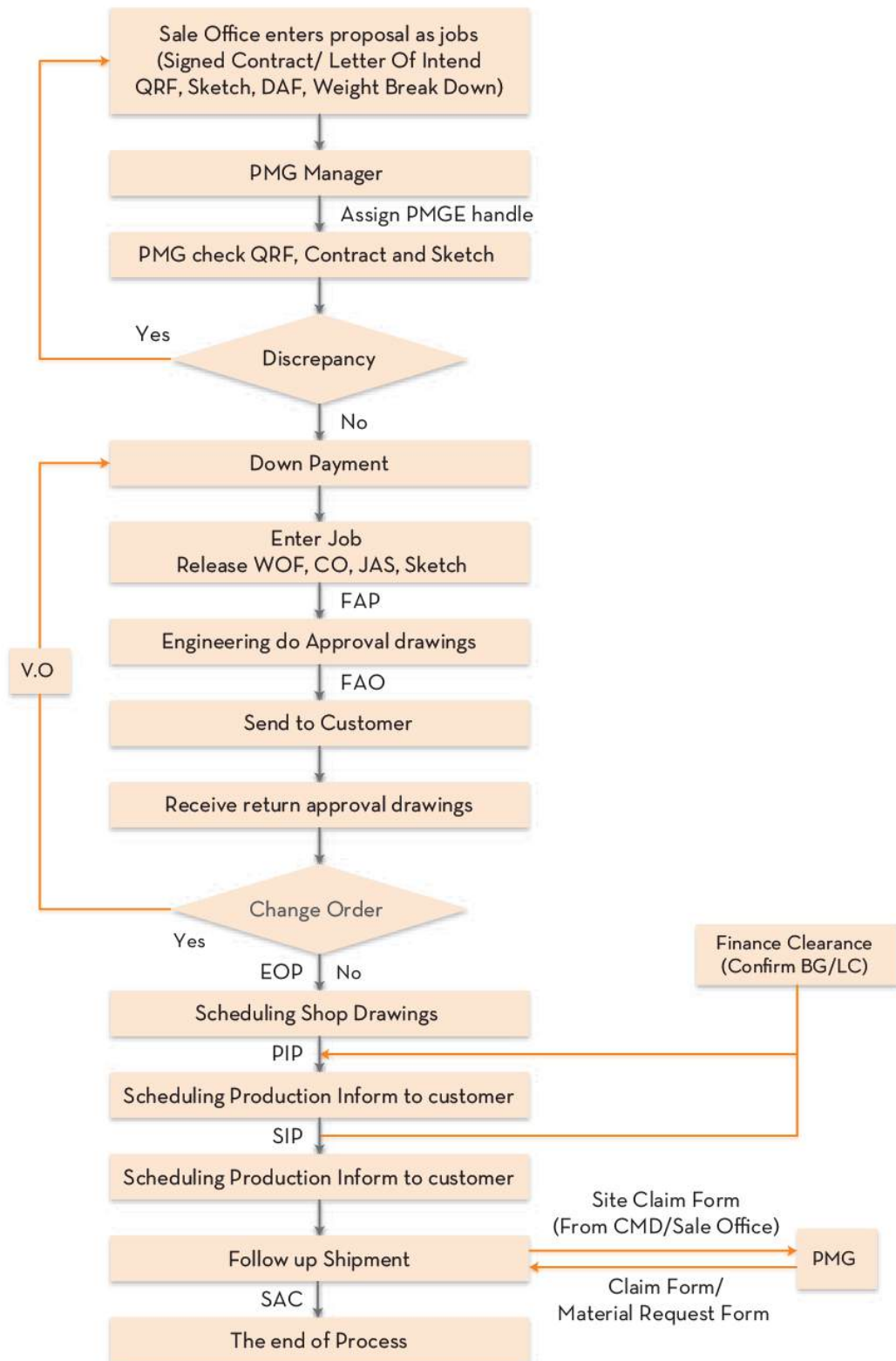
# PROJECT & CONSTRUCTION MANAGEMENT

Project Management

Construction Management



# PROJECT MANAGEMENT



# CONSTRUCTION MANAGEMENT

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## From Our Factory to Your Building

Kirby SEA offers erection services through its authorized builders in Vietnam and supervision services in other regions of SEA.

There are over 85 Kirby certified builders in the region. They have undergone intensive training on erecting buildings of varying complexity and for different applications. Kirby certified builders are highly competent and offer skilled expertise to clients. The local Kirby certified builder offers comprehensive services from construction to complete turnkey solutions.

Kirby provides extensive technical advisory services to its clients - from selection of appropriate structures and economic design to adaptation of local building codes. To ensure excellent quality and customer satisfaction, Kirby's Technical Service representatives monitor and supervise the entire project until completion.

## Safety First

Kirby has a commitment to manufacture quality-building components that are designed to meet the structural requirements of the building.

The safe working condition and accident prevention practices are always on top priority for Kirby. We adhere to national safety and health standards to ensure safety of team working on site.

We collaborate with all parties present on the job site, including owners, architects, engineers, contractors, subcontractors, delivery personnel, and employees among others to implement safety plan.

We ensure that the employees understand the safest and most productive way of erecting a building along with emergency telephone numbers, location of first aid stations and emergency procedures. We do not allow workers to work during inclement weather condition like high wind/typhoon, lightning and rain.

We hold daily meetings highlighting safety procedures and the usage of hard hats, rubber sole shoes for roof work, proper equipment for handling material and appropriate safety gear, including nets where necessary.

## Introduction

Kirby manufactures high quality, pre - engineered metal buildings. Quality Installation is essential to complete the structure to the satisfaction of the customer.

The installation procedure defined in our installation manual intends to provide Kirby Builders and or installation personnel the recommended procedures for erecting Kirby Buildings safely and efficiently.

The AISC's "CODE OF STANDARD PRACTICE" governs the fabrication tolerances, Installation methods, and all field work associated with the project in question.

## Storage and protection

We give lots of importance to correct storage of materials at site. We advice our customers to store all the materials prone to formation of white rust under dry condition with proper cover to avoid water ingress. Our builders ensure that the materials are unloaded and are kept at defined place.

## Installation

Our trained builders follow the methods statement to erect the building ensuring that the structure is adequately braced at all times before raising the next component. The structure is secured with temporary or permanent bracing before release of raising equipment and at the end of the day, weekends or other shutdowns. When commencing Installation of the building, the first braced bay is erected with all the bracing, eave struts, purlins, girts and flange braces completely installed and all bolts properly tightened to make certain that the building is properly braced.



# CONSTRUCTION MANAGEMENT

## RECOMMENDED TOOLS & EQUIPMENT

The following list of tools and equipment is considered adequate for Installation of most Kirby Buildings. Actual equipment required may vary due to differences in buildings type and size, job site conditions and Installation personnel. This list is intended to serve as a recommendation only and should not be used as a limitation to your inventory of Installation equipment. Use and maintenance of power equipment should be in accordance with the general guidelines set forth in this manual.

Equipment	Q'ty	Specification
Screw Guns (HILTI ST 18 / BOSCH GSR-625TE)	2	With magnetic Hex socket heads & replacement drives
Sheet Metal Nibbler (HITACHI)	1	Electric sheet cutting tool with replacement bits.
Power Impact Wrench ( BOSCH GDS 30 )	2	With assortment of impact sockets - 12mm to 24mm
Electrical Drill Motors (BOSCH/ KPT/ HITACHI)	2	12mm (1/2") with twist drill
Skill Saw (HITACHI / BOSCH /DEWALT)	1	Electric or gas powered with metal & Carbide tip blades.
Electric Extension Cords		Sufficient for maximum numbers of tools used at once
Electric Arc Welder (ADWANI)	1	With leads and extra welding head
Generator	1	To supply job site electrical power.
Gas Cutting Torch	1	With hose, gauges and replacement heads
Socket Wrenches (HAWS / TAPARIA) and ratchet drive handle	2	Sets 12 mm (1/2") drive with assorted sockets
Spud Wrenches (TAPARIA/HAWS/EVEREST)	5	Each assorted sizes 12 mm to 24mm
Box End Wrenches (TAPARIA/HAWS/EVEREST)	2	Sets assortment 12 mm to 24 mm
Open End Wrenches (TAPARIA/HAWS/EVEREST)	2	Sets assorted sizes 12 mm to 24 mm
Vice Grip Pliers	10	
Pop Rivet Tool (STAR)	2	Manual
Hammers	2	EA Shop, Sledge, Rubber
Sheet Metal Cutter (RIDGE)	1	EA left, right, straight
Wrecking Bars	2	Heavy Duty
Drift Pins	4	Heavy Duty

# CONSTRUCTION MANAGEMENT

Hack Saws	4	With assorted blades
Chokers (HUK CHUK)	2	3/8"
Chokers (HUK CHUK)	4	1/2"
Cable Clamps		Assorted Sizes
Slings (MADRAS AUTO)	4	With Clevises
Spreader Bar	1	EA 3m, 5m
1/2", 3/4" Wire Rope		100M with 8 turnbuckles
Work Platform	2	6M, Steel or Plywood reinforced
Chain Block (INDUS)		3T, 5T
Electric Extension Cords	2	6M
Safety Belts with tool pouches (KARAM/ISI TESTED BRAND)		Sufficient for Crew
Hard Hats (KARAM/ METRO)		Sufficient for Crew
Goggles	2	for power cutting
Goggles	2	for boring equipment
Hand Gloves		Sufficient for Crew
Steel Measuring Tapes (FREE MAN)	4	EA 4 M
Steel Measuring Tapes (FREE MAN)	2	EA 15 M and 30 M
Magnetic Spirit Level	2	1' to 4"
Framing & Try Squares	1	EA
Transit & Level Rod	1	EA
Plumb Bob & Chalk String	2	1/2Kg, 1Kg
Nylon Line 3/8"		100M
Manila Rope		100M EA 3/8', 1/2"
Caulking Guns	4	Cartridge Type









# PROJECT REFERENCE LIST WITH PHOTOGRAPH

## PROJECTS

### Locations:



Philippines



Indonesia



Thailand



Myanmar



Vietnam



Singapore



Malaysia



Cambodia



Australia



Laos



Sri Lanka



Bangladesh

## REFERENCES

Industrial

Infrastructures

Office

Sports & Recreations

Transports

Community & Cultural

Retail

Resources

Health

Education

Utilities



Categories





THACO Auto Showroom



Mazda Showroom



Me Linh Plaza - Ha Dong





# PROJECTS IN VIETNAM

Mong Duong Thermal Power Plant



Hangar



Olam pepper factory





# PROJECTS IN VIETNAM



FEEDONE Aquatic Food Factory



Alibaba Warehouse



Renaissance fashion clothing factory







## PROJECTS IN SRI LANKA & BANGLADESH



Sri Lanka: TCB Warehouse



Bangladesh: Universal men's clothing Factory







# PROJECTS IN PHILIPPINES

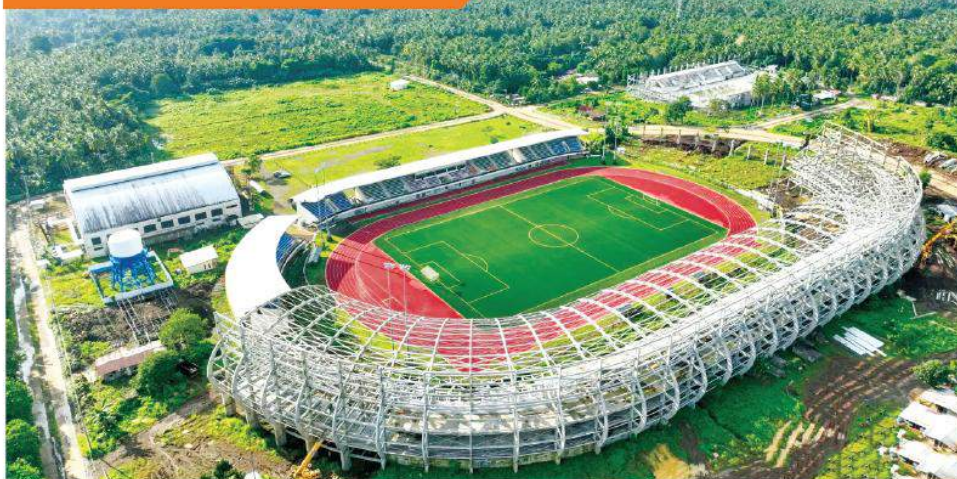
Cebu International Airport



Clarín Bridge



Davao Stadium





# PROJECTS IN PHILIPPINES

GDR Tower: Multi - storey building



Warehouse



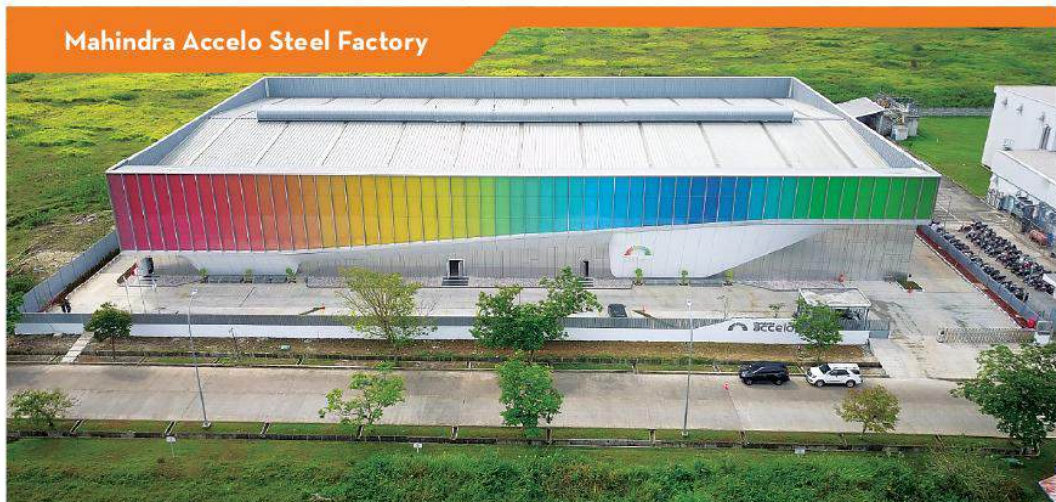


# PROJECTS IN INDONESIA

Bali Trans Studio



Mahindra Accelo Steel Factory



RAPP Factory

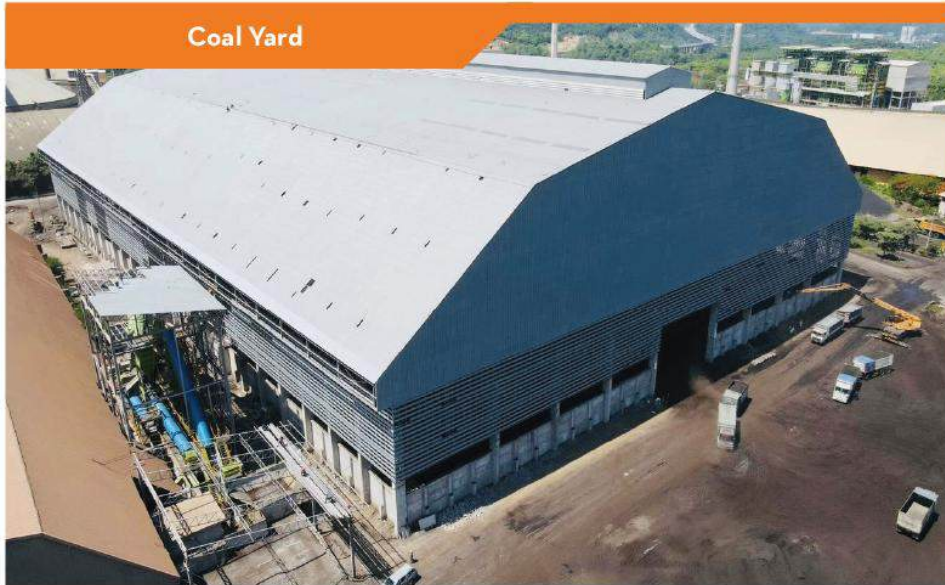






## PROJECTS IN THAILAND

Coal Yard



Denla British School



Warehouse







## PROJECTS IN MYANMAR

SINMA Showroom



Adilac Medical Center



PHEE Warehouse







# PROJECTS IN SINGAPORE & MALAYSIA



High rise Building - Singapore



Warehouse & Factory - Malaysia







## PROJECTS IN CAMBODIA & LAOS



Cambodia: Sumi Wiring System Factory



Laos: Sumi Wiring System Factory







## PROJECTS IN AUSTRALIA

Penrith Mall



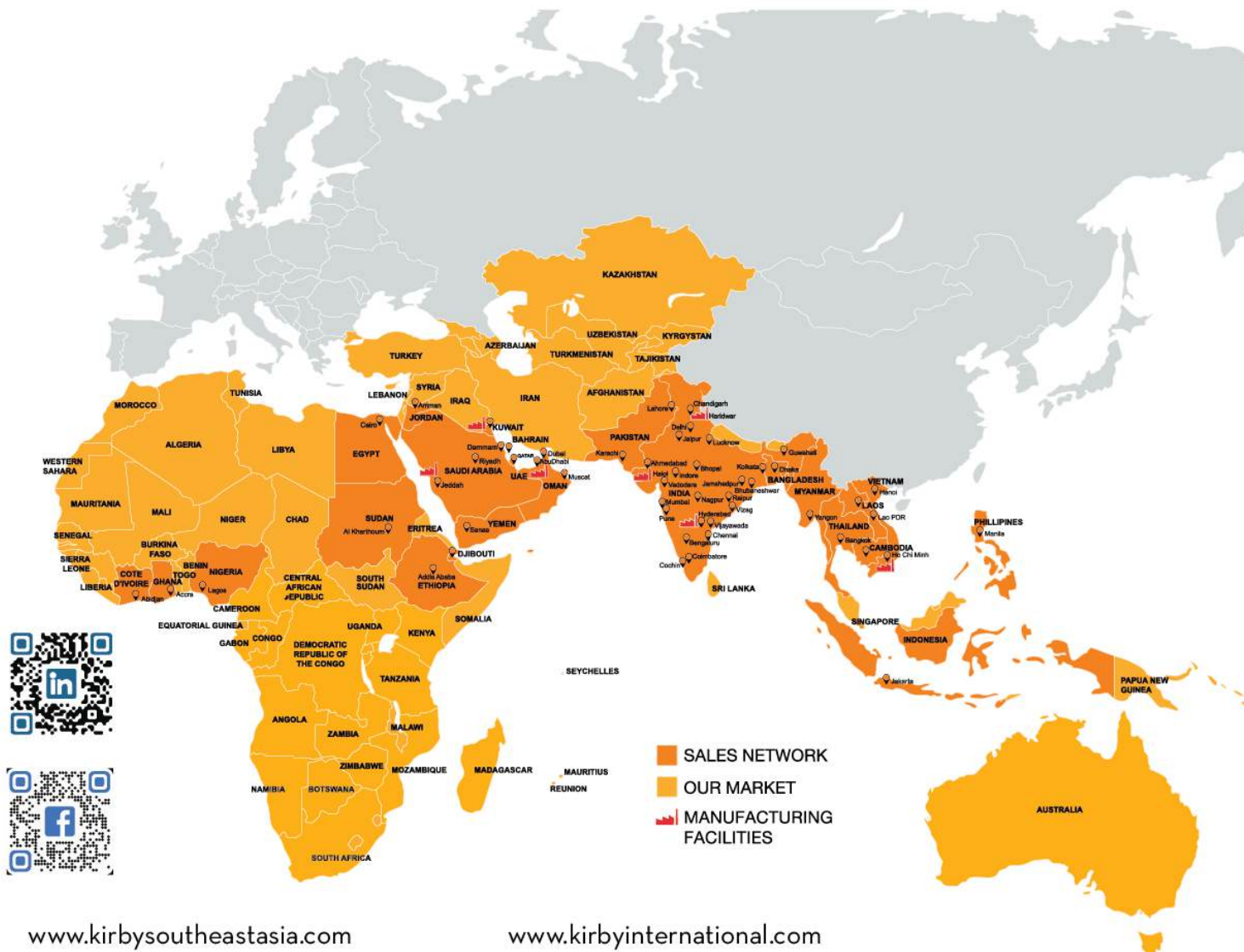
Bingo Eastern Creek Recycling Factory



Schofields Buddhist Temple







A subsidiary of **Alghanim Industries**

**KIRBY SOUTHEAST ASIA**

#### **Dong Nai Plant, Vietnam**

Road No.8, Nhon Trach III Industrial Zone, Phase II, Nhon Trach District, Dong Nai Province, Vietnam.

#### **Shuaiba, Kuwait Plant**

KIRBY BUILDING SYSTEMS - KUWAIT, Plot 1, Block 2, West Shuaiba Industrial Area, P.O. Box 23933 Safat, 13100 Kuwait.

#### **Ras Al Khimah, United Arab Emirates Plant**

Al Jazeera Industrial Area II, Ras Al Khaimah, Uae, P.o. Box 6624, Ras Al Khimah, UAE.

#### **Jeddah, Saudi Arabia Plant**

KIRBY CONTRACTING COMPANY (SPC) L.L.C., Industrial City -1, P.O. Box 86648, Jeddah - 21492, Saudi Arabia.

#### **Hyderabad Plant, India**

Unit 1, Plot Nos 8-15, IDA Phase III, Pashamylaram, Sangareddy Dist. - 502 307, Telangana, India.

#### **Haridwar Plant, India**

Unit 2, Plot No 2, Sector 11, Integrated Industrial Estate, SIDCUL, Haridwar - 249 403, Uttarakhand.

#### **Halol Plant, India**

Plot No 741, 742/1, 748, 749, Halol GIDC Phase-II, Halol Maswad Industrial Estate, Halol Godhra Highway, District Panchmahal, Gujarat - 389 350, India.

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