

# **ENGINEERING EXCELLENCE**





# **Vision**

- Be the Employer of choice
- > Attract, retain, and nurture talent
- > Strive for improving operational efficiency through BPR
- Adopt leading practices for continuous improvement in people, processes, and technology
- Achieve business growth through appropriate collaborations and tie-ups
- Build trust by delivering on customer promise through quality and timeliness
- Complete solution provider
- > Enhancing customer delight
- ➤ Contribute in Nation's growth
- > Save the environment

# **Mission**



Is the fastest growing and diversified EPC contracting company in the country, offering one-stop solutions – from concept to commissioning – in Bulk Material Handling Metal / Coal / Ash / Mineral Beneficiation Plants, Chemical & Fertilizer Plants, Shop Fabricated Equipment, Water, Power Transmission, Solar etc.

We provide turnkey solutions to core industries like Coal, Mining, Port, Steel, Cement, Ash, Fertilizer, Infustructure, Power and Defence. With best in class products / services we are all set to enter aggressively into the global market.

01	Sectors We Serve
02	Diverse Engineering Divisions
04	Manufacturing Division
07	Bulk Material Handling Division
14	Coal Chemical Division
18	Ash Handling Division
22	Strategic Business Division

Underground Mining Division		
Power Transmission Division		
Water Treatment Division		
Defence Sector		
Consultants, Inspection Agencies & Certifications		
Our Presence		

# **SECTOR WE SERVE**

Manufacturing Division	
Bulk Material Handling Systems	
Coal Chemical Division	
Ash Handling Division	
Mineral Beneficiation	
Strategic Business Division	<u> </u>
Underground Mining Conveyor	
Power Transmission	***************************************
Water Treatment	
Defence Sector	

# LEADING AHEAD WITH DIVERSIFIED &

# **EXTENSIVE CAPABILITIES**



# Manufacturing Infrastructure

• Preparatory Workshop • Welding Facilities • Semi-Automatic Welding Method • CNC Profile Cutting M/C • Manufacturing Process • Major Machine Details • Handling Materials • Packing • Transportation



## **Bulk Material Handling Division**

- Coal Handling Plant Raw Material Handling Plant Ferro-Alloy Storage & Charging System
- Troughed / Trunk / Gate / Surface / Steel cord / Pony belt / Bucket Elevator / High Angle / Pipe Conveyor System • Stock House Bins • SILO • Screening Plant • Limestone & Gypsum Handling System • Autometic Baggage Handling & Wagon Loading System • Overground Bunkers



## **Bulk Material Handling Products**

- Shuttle Conveyor Bucket Elevator Chute Mechanical Vibrating and Reciprocating Feeder
- •Travelling Tripper Wagon Loader Telescopic Chute, Rack and Pinion / Flap Gate Skip Hoist
- Idlers Pulleys Bag Diverter Plough Diverter Paddle Feeders Flapgates Chutes Internal Scrapper



#### **Coal & Chemical Division**

• Coke Oven by-product / Ammonium Sulphate / Sulphuric Acid / Benzol Plant • Sinter Machine and BOF Gas Holder • Coal Charging Car of Coke Oven Battery • BOF e-dusting System • Exhauster • Roll Grind Shop • Final Gas Cooling Cum Naphthalene Scrubbing • PGC • Electric Arc and Ladle Refining Furnace • Auxiliary Furnace Parts • Vacuum Degassing • Billet / Bloom Caster • Gas Cooling and Condensation system • Decantation system • Decanter and associated accessories



#### **Coal & Chemical Products**

- Shell and tube heat exchangers Primary gas cooler Pressure vessels Process / Distillation columns
- Continuous digesters Blending vessels Agitator / Condensate tank Water-cooled jacket Boiler components BA hopper and filter separator Blowing boxes Platform structure for continuous casting plant Recuperator Chimney Tar pre-separator Claus catalytic crystallizer Absorber and pre-absorber Nuva feeder vessel





# **Ash Handling Division**

• Bottom Ash Handling System, • Fly ash Handling system • Ash Lean Slurry Disposal Sysyem • HCSD System • Silo Unloading System • Rail Loading System



## **Mineral Beneficiation**

• Iron Ore Beneficiation • Chrome Ore Beneficiation • Coal Washeries



# **Strategic Business Division**

- Hydraulic Press Ore Beneficiation and Palletisation Coal Washeries Industrial Furnaces
- · Electrostatic Precipitators · ESR Furnace · ETP



## **Power Transmission Division**

**Transmission Towers** 



## **Water Management Division**

- Water Intake, Transportation, Treatment, Distribution and Network Management Desalination
- Sewerage Collection Network, Treatment and Recycling Industrial Effluent Treatment Sludge Management WTP Water Purification Unit



#### **Defence Sector**

- Mat Ground Surface Mechanical Mine Layer Cribs Bridging System Craftsmen Shelter
- Sophisticated Spares for Critical Equipment Workshop Light Bailey Bridge CL3 Aluminium Bridge



# **Agro Division**

- Power tiller / weeder / reaper Garden tools
- · Tractor implements · Bio toilets







# **MANUFACTURING DIVISION**

A Kolkata based manufacturing company having well-equipped modern Machine Shops, which include Heat Treatment, Precision Grinding, and Fabrication facilities of all descriptions including Sheet Metal work.

We have our presence in West Bengal in four factories out of which Three are in Dum Dum, Kolkata and One in Durgapur with the spread across of 400000 sqft area in total.

# Manfacturing Excellence & Wide Range of Capabilities

We have the most modern facilities equipped with the state-of-the-art infrastructure including CNC machines. We are producing many complex industrial products. Manufacturing excellence enables us timely delivery with strict compliance to quality and standard.



#### WELDING FACILITIES:

Shielded Metal Are Welding (SMAW) | Submerged-Arc Welding (SAW) |
Gas Metal Arc Welding (GMAW) | Gas Tungsten Arc Welding (GTAW)

SEMI AUTOMATIC WELDING METHOD: Submerged-Arc Welding (SAW) | Gas Metal Arc Welding (GMAW)





PREPARATORY WORKSHOP



SHEARING MACHING



**HYDRAULIC PRESS** 



**EOT CRANE (HANDLING MATERIALS)** 



**ROLLING MACHINE** 



BEARING PUSHING MACHINE



**GOLIATH CRANE (HANDLING MATERIALS)** 



DYNAMIC BALANCING MACHINE



LATHE MACHINE

# CNC PROFILE CUTTING M/C





FACILITIES: Work Area 3MTR. X 12MTR

# FLAME CUTTING - SEMI AUTOMATIC | PLASMA CUTTING

# PACKING & TRANSPORTATION













BLASTING & CNC m/cs





# BULK MATERIAL HANDLING DIVISION

Entered the Bulk Material Handling Equipment sector in the 1980s. Today, with more than 30 years of experience in this field, we now work for some of the most prestigious clients in the country. Our scope of work entails the design, manufacture, supply, erection and commissioning of Bulk Material Handling projects on a turnkey basis.

Our operational sectors see us offer equipment and components for industrial systems in sectors like Steel, Power, Oil and Gas, Cement, Mining, Coal and Minerals, Fertilizer, etc.







# P WERING

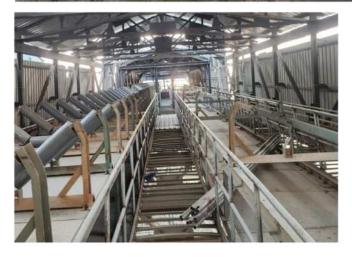
Progress - The Ambition to Energize Tomorrow

# **ONGOING PROJECTS**

Coal handling plant for BHEL Bangladesh Maitree (BIFPCL)









COAL HANDLING PLANT AT YADADRI

ASH HANDLING PLANT AT YADADRI



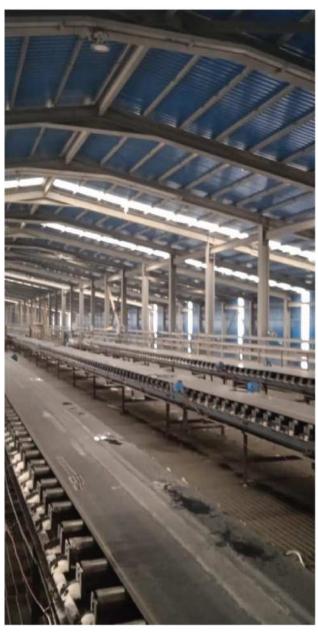
UDANGUDI SUPER CRITICAL THERMAL POWER



WAGON TIPPLER PACKAGE, NTPC BHEL



UREA HANDLING & BAGGING PACKAGE AT TFL, TALCHER



UREA HANDLING PLANT AT SINDRI & BARAUNI



2X660 MW ENNORE SEZ SUPER CRITICAL THERMAL POWER PROJECT



COAL HANDLING PLANT AT PAKRI



COAL HANDLING PLANT AT NORTH KARANPURA



COAL HANDLING PLANT AT BHEL, BARAUNI



NMDC, NAGARNAR PROJECT: RMHS SINTER ROUTE & COAL ROUTE



COAL HANDLING PLANT AT NBPPL, UNCHAHAR





COMPLETE MECHANIZED COAL HANDLING SYSTEMWITH 10000 TONS RCC OVERGROUND BUNKER WITH RAPID LOADING SYSTEM FOR NTPC - PAKRI BARWADIH MINES



# **P** WERING

# **Progress -** The Ambition to Energize Tomorrow

# **PAST PROJECTS**



BELT CONVEYOR SYSTEM FOR TRANSPORTATION OF CALCINED DOLOMITE AT SAIL- DSP



COKE HANDLING SYSTEM WITH RLS & PIPE CONVEYOR AT MRPL



NEW CRUSHER BUILDING AND ASSOCIATED CONVEYORS PLANT AT SAIL BOLANI



EPC FOR BAGGING PLANT EXPANSION AT TCL, BABRALA



CHP AT BHEL WANAKBORI (1X800MW) EXTENSION TPS UNIT # 8 (GSECL)





# **Bulk Material Handling Equipment**

The following products feature prominently in our catalogue of offerings and are used to provide turnkey solutions to various companies in myriad sectors.



**GEAR BOX** 



PADDLE FEEDER



TRAVELLING TRIPPER



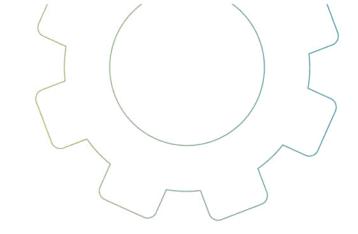
PIPE CONVEYOR



TELESCOPIC CHUTE



MECHANICAL VIBRATING & RECIPROCATING FEEDER







**RACK & PINION GATE** 

SCREW CONVEYOR





**CONVEYOR IDLERS** 









PULLEYS BELT CONVEYOR

SHUTTLE CONVEYOR



# **COAL CHEMICAL DIVISION**

Coal Chemical Division manufactures critical components and provides turnkey solutions for coke oven by-product recovery, which are otherwise potentially harmful chemicals that could have an adverse environmental impact and also damage plant equipment. Our clients in India are increasingly focused on managing and meeting sustainability targets, generating value out of it and ensuring longevity of their plants. We provide solutions in handling coal tar, ammonium sulphate, benzol and other chemical plants.

The following products feature prominently in our catalogue of offerings and are used to provide turnkey solutions to various sectors and industries.

- Absorber
- Agitator Tank
- Condensate Tank
- > FBD (Fluid Bed Dryer)
- Pressure Vessels

- Recuperator
- Saturator
- Decanter
- > Primary Gas Cooler
- Electrostatic Tar Precipitator











COLUMNS (SS-MS)



STACK



**FURNACE & ITS EQUIPMENTS** 



FLY ASH SILO



**DECANTER** 



STORAGE TANKS



PROCESS COLUMN AT IOCL - 40M LONG



# P WERING

Progress - The Ambition to Energize Tomorrow

# **ONGOING PROJECTS**



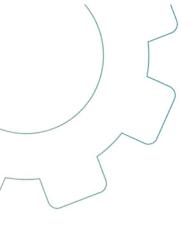
AMMONIUM SULPHATE PLANT, SAIL - BOKARO



ELECTRIC EXHAUSTER FOR SINTER PLANT, SAIL - BOKARO



TAR DECANTER FOR COKE OVEN BATTERY, SAIL - DURGAPUR







PRIMARY GAS COOLER & GAS PRE-COOLER, SAIL - ROURKELA STEEL PLANT



BENZOL ABSORPTION & DISTILLATION PLANT AT SAIL - DURGAPUR



AMMONIUM SULPHATE RECOVERY PLANT, RINL-VIZAG



SAIL, DSP PRIMARY GAS COOLER



DE-NITRATION PLANT PROJECT FOR HEAVY WATER BOARD



ELECTRIC EXHAUSTER FOR COKE OVEN BY-PRODUCT, SAIL - DURGAPUR



# ASH HANDLING DIVISION

BTL EPC Ltd entered the Bulk Material Handling Equipment sector in the 1980s. With over 40 years of experience, we now proudly serve some of the most prestigious clients in the country. Our comprehensive services encompass the design, manufacture, supply, erection, and commissioning of Bulk Material Handling projects on a turnkey basis. We provide equipment and components for industrial systems across a variety of sectors, including Defence, Steel, Power, Oil & Gas, Cement, Mining, Coal, and Mineral Beneficiation.

In 2022, we further expanded our expertise by entering the Ash Handling sector, securing the largest Ash Handling project to date for the Yadadri Thermal Power Plant (5x800MW) of TSGENCO in India.



ASH SLURRY DISPOSAL PIPING (OUTSIDE PLANT BOUNDARY) AT YADADRI



ASH SLURRY PUMP HOUSE AT YADADRI



- Flushing Nozzle
- Over Flow Louver
- Vent Louver
- BA Access Door
- Poke Door
- Ms Adaptor For Vent Filter Of FA Silo
- 400 NB Pipe Sleeve On Top Of Silo
- Man Hole On Top Of Silo
- Pipe Sleeve For Silo Fluidization Pad 100 Nb
- Adaptor For Pr. Relife Door On FA Silo Top
- Pipe Sleeve On Top Of Silo
- Adaptor For Fly Ash Silo Outlet Unit 4 & 5
- Adaptor For Fly Ash Silo Outlet Unit 1 &2
- Adaptor For Level Transmiter On FA Silo Top
- Make Up Water Pipe Connection
- Refractory Cooling Arrg.
- Seal Plate Arrangement
- FAE Tower Structure
- BA Overflow Seal Box
- Coarse Ash Tank
- Mixing Box
- Air Receiver For Transport Air Compressors
- Buffer Hopper
- Ar Receivers With Accessories Silo Area
- Jet Pump
- Fly Ash Intake Valve
- Air Intake Valve

- Ejector Feed Sump
- Adopter Below Manual Knife Gate Valve (Eco)
- Flushing Aparatus
- Water Trough Type Expansion Joint (Eco)
- Dust Conditioner
- Telescopic Spout
- Refractory Anchors
- Inspection Door for BA Hopper
- Ms Adopters Below ESP Hoppers
- Fluidizing Pads For ESP Hopper
- 400 Ns Pipe Clamp With Foundation Bolts
- Ash Slurry Sump Liners
- Drive & Base Frame For Clinker Grinder
- Seal Through Overflow & Drain Conn.
- · Cone For Inspection Window
- Door Nozzle
- Seal Through Flushing
- Ms Adaptor (Aph, Duct & Scr Hopper)
- Hanging Supports
- 400 NB Sleeve Couplings For Ash Slurry
- Disposal System
- 250 NB X 90 Deg Elbow
- 10" Spool Piece
- Wetting Head
- BA Overflow Tank
- Adapter For Wetting Head



# ASH HANDLING Equipments

The following products feature prominently in our catalogue of offerings and are used to provide turnkey solutions to various sectors and industries.



**BAG FILTER** 



**COLLECTOR TANK** 



HYDROEJECTOR (JET PUMP)



FEED GATE ENCLOSURE



AIR RECEIVER (PLANT AREA)



FLY ASH FEED VALVE



MS ADOPTER



SLEEVE COUPLING



CLINKER GRINDER



VACUUM BREAKER



UNEQUAL TEE 10"X10"X8"



UNEQUAL TEE 8"X8"X6"



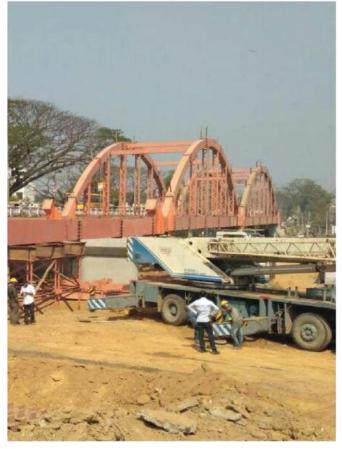


# STRATEGIC BUSINESS DIVISION

In 2014, leveraging our existing technological partnerships, manufacturing capabilities, and project management expertise, we established a new Strategic Business Division focused on providing turnkey solutions to support the primary functions of a plant.

Our solutions encompass a broad range of industries, including Coal Washing Plants, Ore Beneficiation Plants, Utilities and Balance of Steel Plants, Industrial Furnaces for Heating and Melting, Hydraulic Presses, and Electrostatic Precipitators.

# **COMPLETED PROJECTS**



FABRICATION & SUPPLY OF STEEL ARCH BRIDGE FOR NCC AGARTALA, KATAKHAL FLYOVER PROJECT



DISMANTLING & EPC OF BOF GAS HOLDER AT SAIL, DURGAPUR



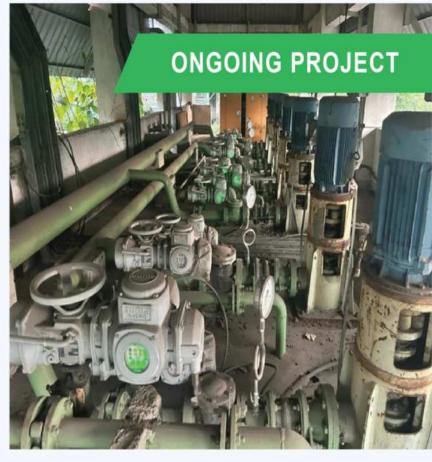
ELECTROSLAG REMELTING (ESR) FURNACE METAL & STEEL FACTORY FOR MINISTRY OF DEFENCE AT ICHHAPUR



ETP OF TATA NINL JAJPUR



HYDRAULIC CABBAGING AND DRAWING PRESS FOR OFAJ AMBAJHARI



DVC - BOKARO (PRE TREATMENT AND ETP PLANT)





# UNDERGROUND MINING CONVEYOR

Is an established name in coal mines, providing unique solutions for mine conveyor applications. We cater dual drive conveyors / drive heads of various combinations e.g. 2 x 37 KW, 2 X 55 KW, 2 X 75 KW, 2 X 90 KW, 2 X 110 KW, 2 X 150 KW, 2 X 200 KW, 2 X 250 KW, 2 X 315 KW including the highest installed motor power in the country at 2 x 600 KW. These unique conveyors have significant presence in all Coal India mines at SECL, WCL, ECL, MCL and BCCL. We also cater to requirements of SCCL as well as those of many private mines.

Over the last 30 years we have supplied our own make of drive heads and conveyors to Coal India and all its subsidiaries, as well as private mines.

COLLIERIES		TOTAL NO OF CONVEYORS
South Eastern Coalfields (SECL)		235
Mahanadi Coalfields (MCL)	19-50	21
Western Coalfields (WCL)	5557	55
Bharat Coking Coal Limited (BCCL)		15
Eastern Coal Fields (ECL)		35
Singareni Collieries (SCCL)		55
Central Coalfields (CCL)		1
Private Collieries	227	20

# CONVEYORS & DRIVE HEADS SUPPLIED SO FAR TO NON-CIL

Gayatri-Moonidih (GPL)		Conveyors & Drive Heads Supplied
INDU	1449	2x600 KW Conveyors Supplied
Ultratech	\$ 550 p. 7	Underground Conveyors & Drive Heads Supplied
JMS Mining	4000	Underground Conveyors & Drive Heads Supplied











GEAR BOXES FOR UNDERGROUND CONVEYOR





# POWER TRANSMISSION DIVISION

Extended its manufacturing and EPC expertise in 2015 to the area of power transmission towers in deference to the huge demand for the setting up of new lines for power evacuation.

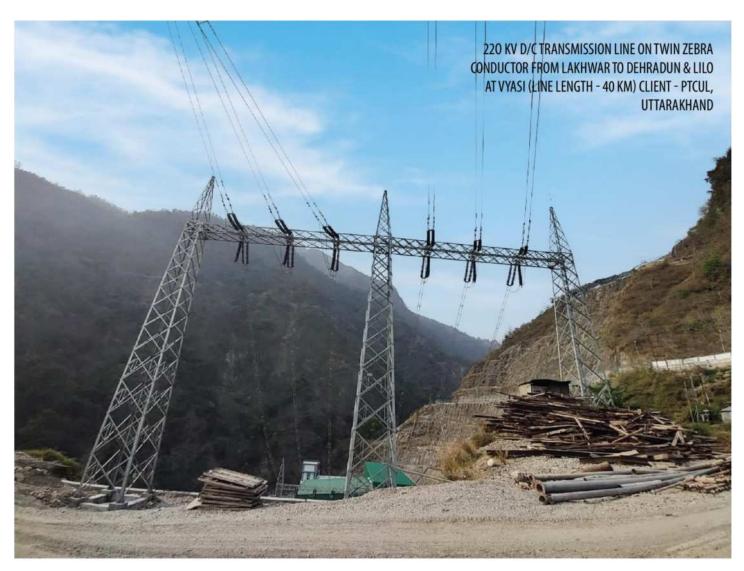
The overall power transmission network is developed and operated under the aegis of the Power Grid Corporation of India (PGCIL), State Electricity Boards and a few private players (Tata, L&T, Sterlite among others) in accordance with the requirements of the new lines (132 KV to 1100 KV) and sub-stations.



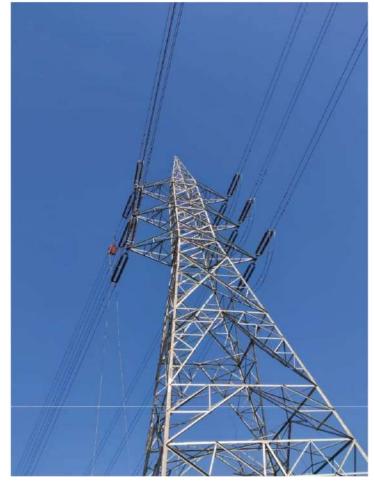
66 KV D/C TRANSMISSION LINE AT MANALI (LINE LENGTH - 9 KM) CLIENT- HPPTCL



132 KV D/C TRANSMISSION LINE FROM RANIKHET TO BAGESWAR - (LINE LENGTH - 43 KM) CLIENT - PTCUL, UTTARA-KHAND









# WATER TREATMENT DIVISION

Stringent Environmental regulations towards sustainability & Government's commitment to supply water for drinking to every part of the country calls for designing the Water System with balanced OHR, Pump House and Distribution.

With robust in-house expertise in Design and Engineering, BTL EPC Limited Water Division has expanded their business in this core area of operation to perform exceptionally well worldwide as a WATER- EFFLUENT TREARTMENT SYSTEM SOLUTION PROVIDER.

BTL supports the customer with the concept engineering, process design, supply, commissioning, system guarantee and training to the operators with full operation & maintenance support including the supply of required spares.

# TARGET AREA

- Steel industry
- Oil and gas fields
- Chemical and petrochemicalplants
- Thermal or combined cycle power plants
- Food Industry
- Paper Mills
- Chemical and fertilizer industries
- Municipal areas



INTAKE PUMP HOUSE WITH VERTICAL PUMP



WATER TREATMENT PLANT



# **DEFENCE SECTOR**

Has been associated with the Ministry of Defence for a long time; to more than 35 years ago, to the days of the very inception of our company. We have, from the outset, been engaged with manufacturing and supplying sophisticated and critical field engineering equipment required by the army.

Among the highlights of our portfolio in this sector are Mat Grounding Surfaces (MGS CL-12, 30, 70), Belly Bridge Components, and Truck Mounted Water Purification Equipment.

# COMPLETED PROJECTS

The following projects give you a glimpse of the challenges we've addressed in the course of our work in providing turnkey solutions to the Defence sector.







MAT GROUNDING SURFACE CLASS 12, 70

BAILEY BRIDGE COMPONENTS

# DELIVERING SOLUTIONS TO INDIA'S LEADING COMPANIES









































































































#### CONSULTANTS



































# INSPECTION AGENCIES







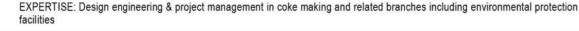


# RELATIONS WITH GLOBAL EPC COMPANIES



DAW







EXPERTISE: Manufacturing chemical plant equipment like compressors, blowers and other accessories



EXPERTISE: Eastern Scientific and Research Institute of Coal, Vuhin - They have over 70 years of experience in R&D and engineering of full production cycle of coke & chemical coking by-products.



EXPERTISE: Complex material handling systems for various industries



(X)

South Korea

EXPERTISE: Design and fabrication of various advanced vacuum and controlled atmosphere furnaces for processing of metals, specialty alloys, and engineered materials



EXPERTISE: Design support of pipe conveyors and high angle downhill conveyor systems



Δ

FUJIAN LONGKING

EXPERTISE: Design, Engineering, Manufacturing, Testing, Commissioning of Hydraulic Press, Shell Forging Press, Ring Rolling Machine



EXPERTISE: Surface Mining & Stockyard Handling Equipments



EXPERTISE: Ash Handling System and largest manufacturer of air pollution protection

CERTIFICATIONS

ISO 45001

ISO 14001

ISO 9001

**OHSAS 18001** 

**DESIGN SOFTWARES** 

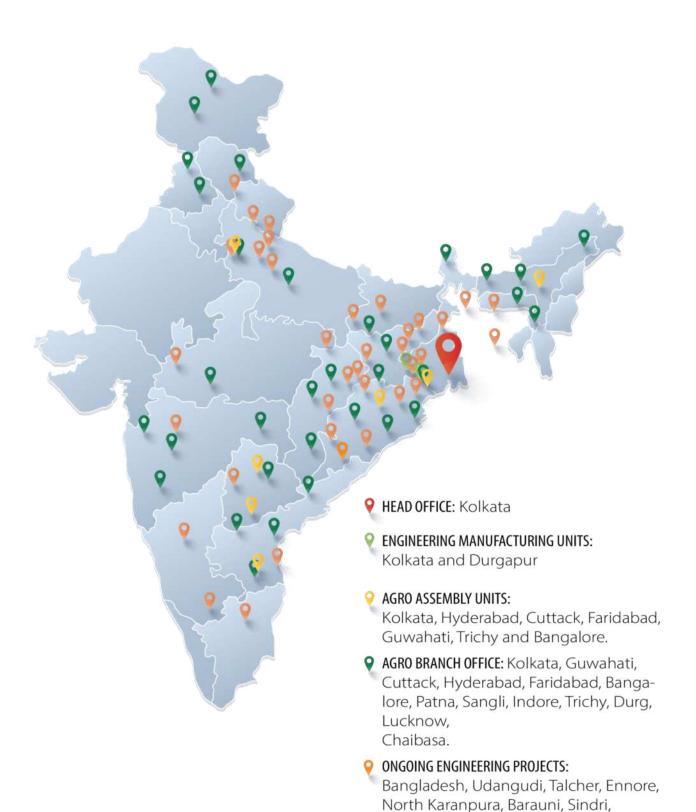
**PVELITE** 

ANSYS

SOLIDEDGE

STADPRO

# Multi GE GRAPHIC Presence



Unchahar, Yadadri, Pakri, Nagarnar, Bokaro, Durgapur, Rourkela, Vizag





## **BTL EPC LIMITED**

CIN No. - U29100WB1992PLC054541 Regd. Office - 2 Jessore Road, Dum Dum, Kolkata - 700 028

# **CORPORATE OFFICE**

Shrachi Tower, 686 Anandapur, EM Bypass, Kolkata - 700 107



enquiry@shrachi.com



98313 08714 90070 80314

## **VENDOR CELL**

Solanki Tower, Salap Howrah (Besides Bhandari Automobiles) West Bengal - 711409

## **SOCIAL MEDIA**





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## **FOR MORE DETAILS**

