



**Indian Concrete Institute**



Your Formwork Partner Since 1991

**MFE FORMWORK**

Speed Quality Efficiency



# MFE – LEADING MANUFACTURER OF ALUMINIUM FORMWORK FORMED IN 1991 AS MIVAN FAR EAST



- **WORLD LEADER IN MODULAR FORMWORK SYSTEM**



- **BASED IN MALAYSIA**

- **CAPACITY OF 120,000 M2/MONTH**



- **ABOUT 75 DESIGNERS**

- **ABOUT 80 SITE SUPERVISORS IN INDIA**



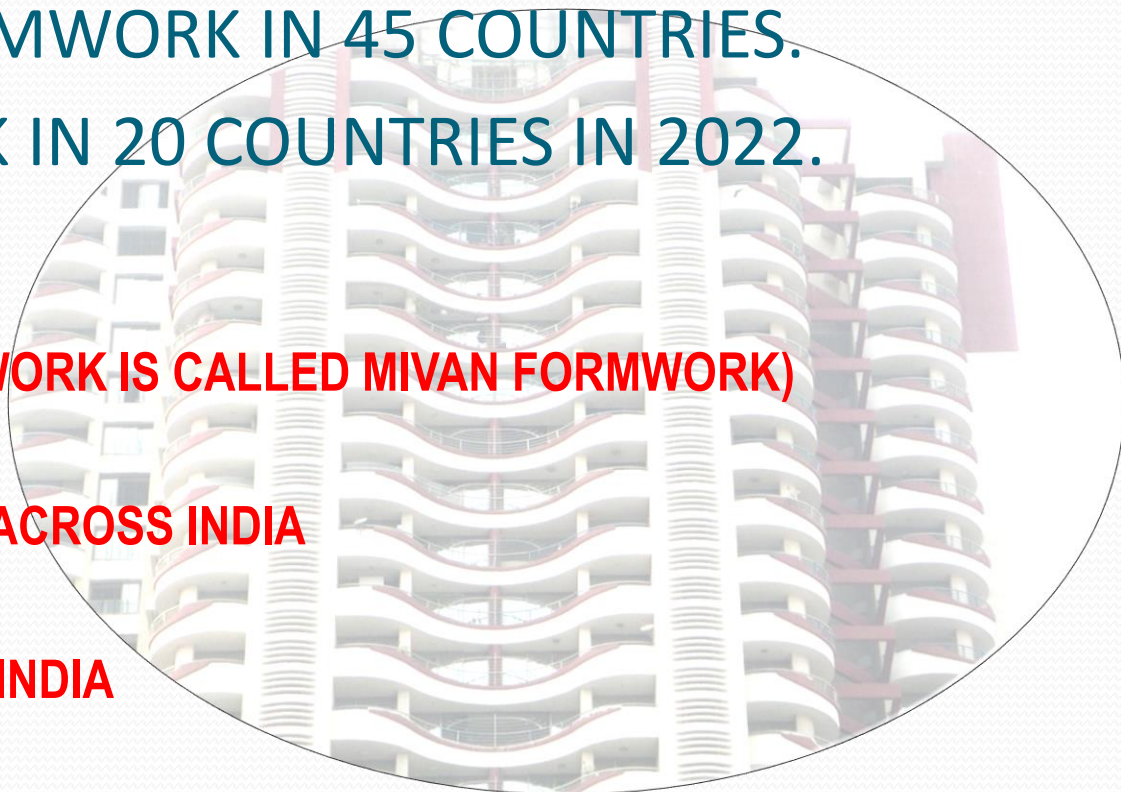


# MFE – LEADING MANUFACTURER OF ALUMINIUM FORMWORK FORMED IN 1991 AS MIVAN FAR EAST



SO FAR SUPPLIED FORMWORK IN 45 COUNTRIES.  
SUPPLIED FORMWORK IN 20 COUNTRIES IN 2022.

- **IN INDIA SINCE 2001  
(IN INDIA, ALUMINUM FORMWORK IS CALLED MIVAN FORMWORK)**
- **MORE THAN 750 PROJECTS ACROSS INDIA**
- **MORE THAN 175 CLIENTS IN INDIA**
- **2022 DISPATCH ESTIMATE OF 570,00 M2 OF FORMWORK IN INDIA.**





# ALUMINIUM FORMWORK PROJECT





# WHAT IS ALUMINIUM FORMWORK

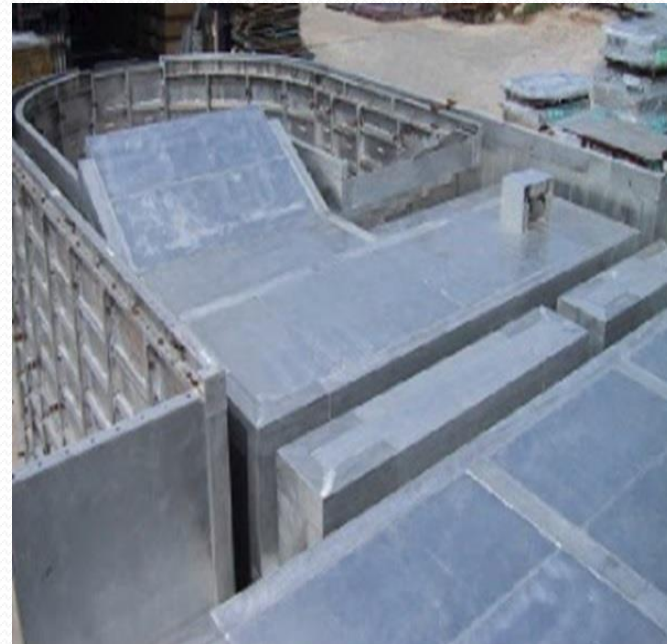


UNLIKE TRADITIONAL FORMWORK, MODULAR ALUMINIUM FORMWORK IS DESIGNED SPECIALLY FOR A PROJECT, MANUFACTURED IN FACTORY WITH PRECISION & ASSEMBLED ON SITE.



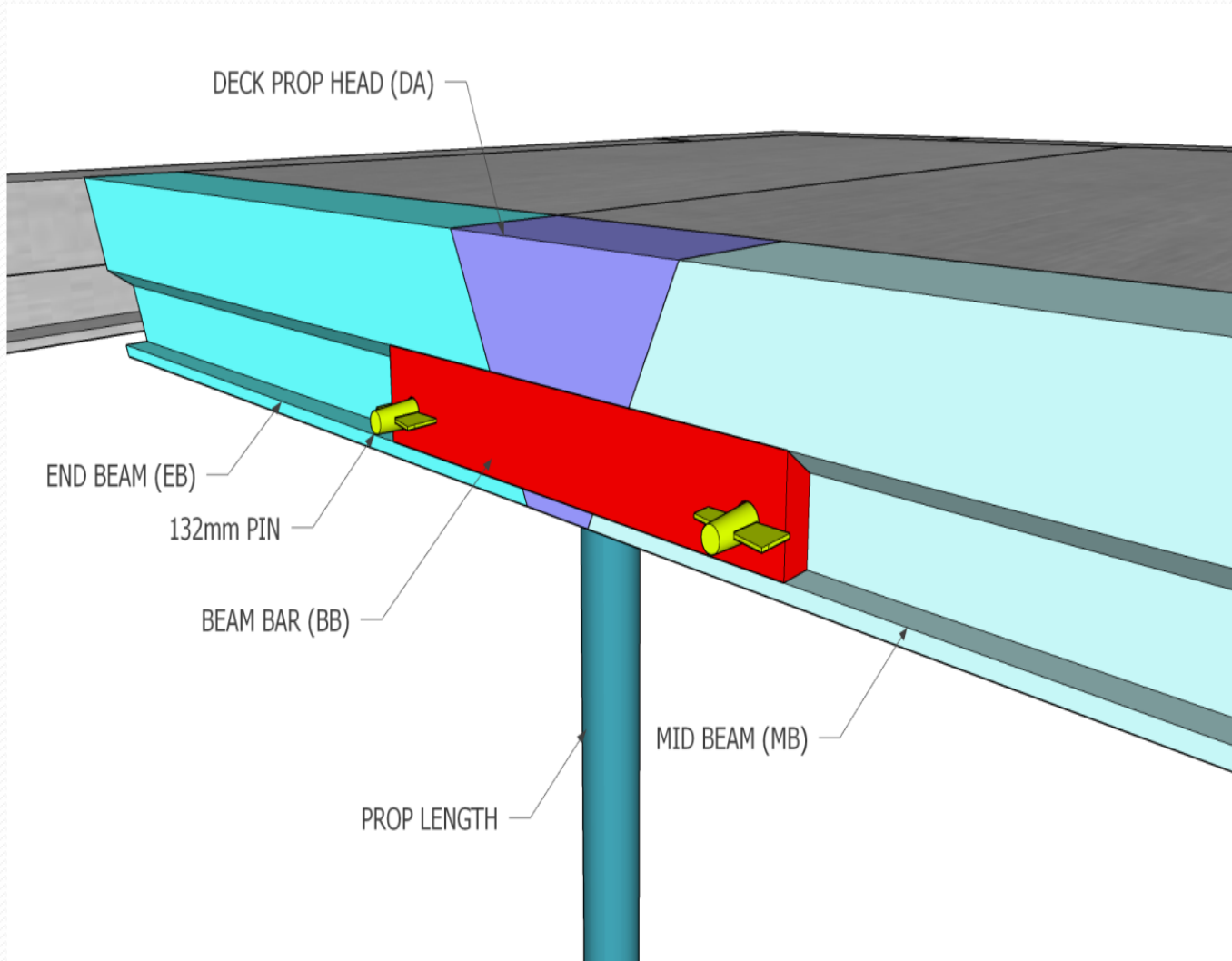


# WHAT IS ALUMINIUM FORMWORK





# WHAT IS ALUMINIUM FORMWORK





# STAGES OF ALUMINIUM FORMWORK



## FREEZE PLAN



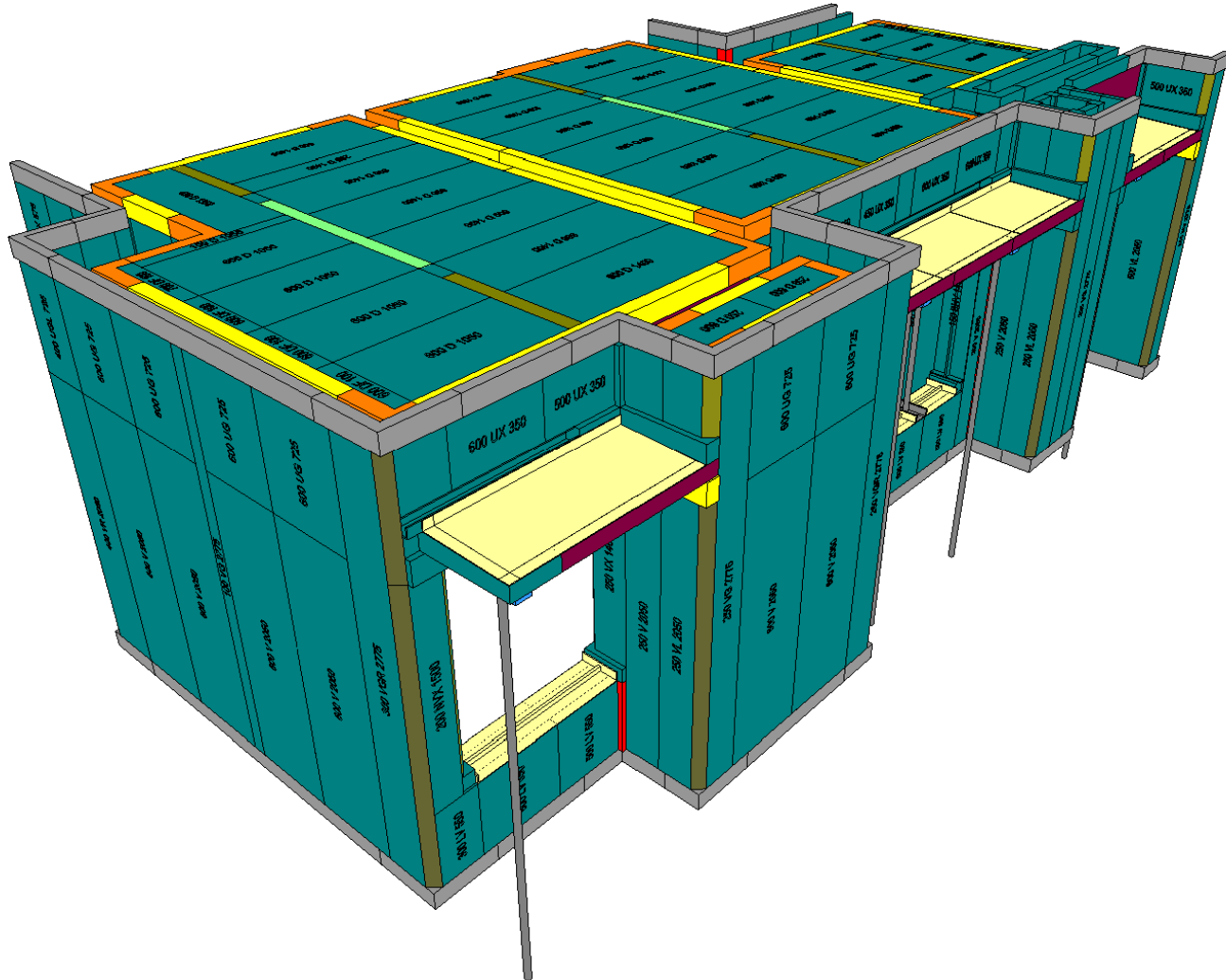




# STAGES OF ALUMINIUM FORMWORK



## DESIGN





# STAGES OF ALUMINIUM FORMWORK



## MANUFACTURING





# STAGES OF ALUMINIUM FORMWORK



## TRIAL ERECTION OF COMPLEX PART





# STAGES OF ALUMINIUM FORMWORK



## ERECTION ON SITE

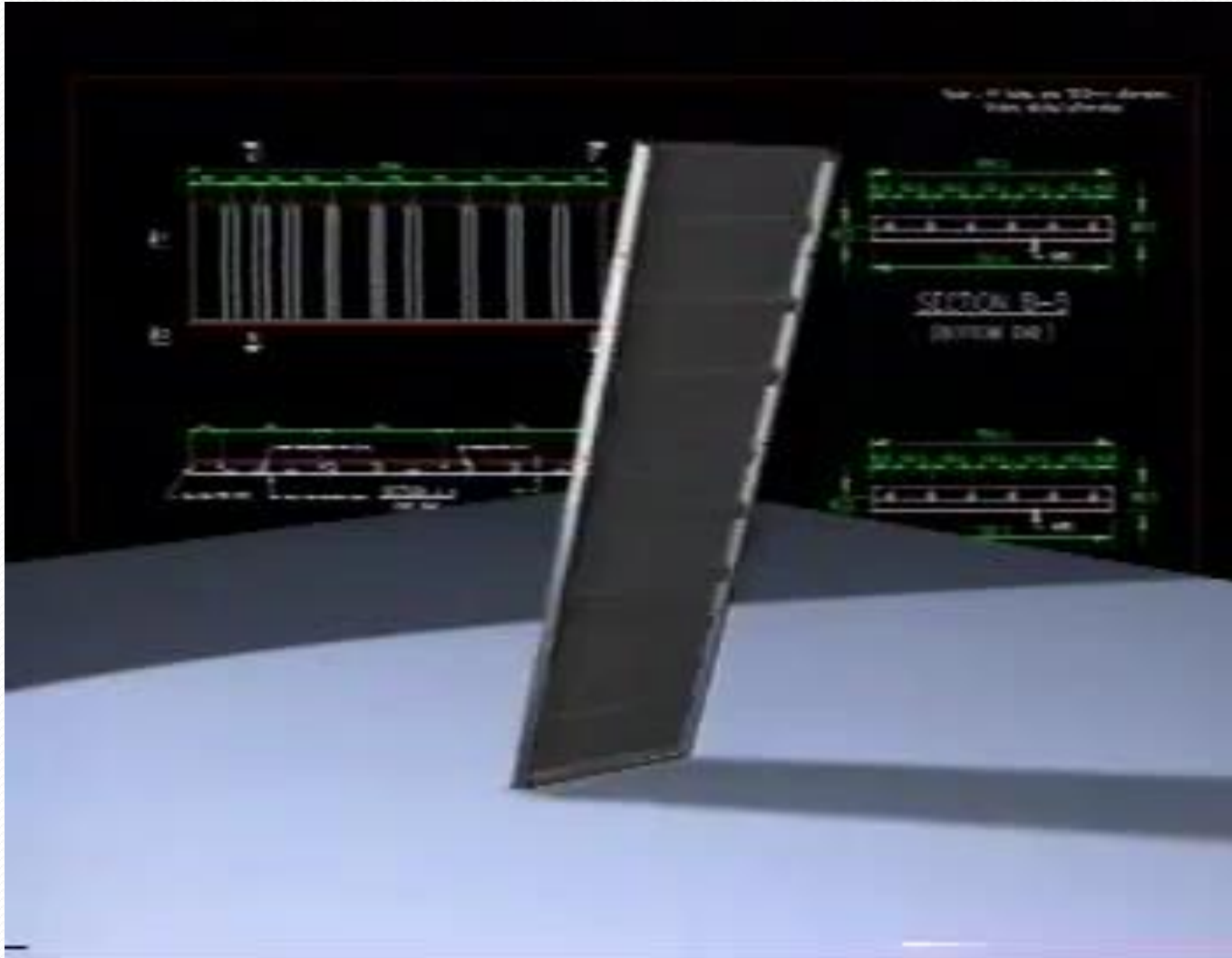




# SALIENT FEATURES OF ALUMINIUM FORMWORK



## SIMPLE PIN/WEDGE SYSTEM

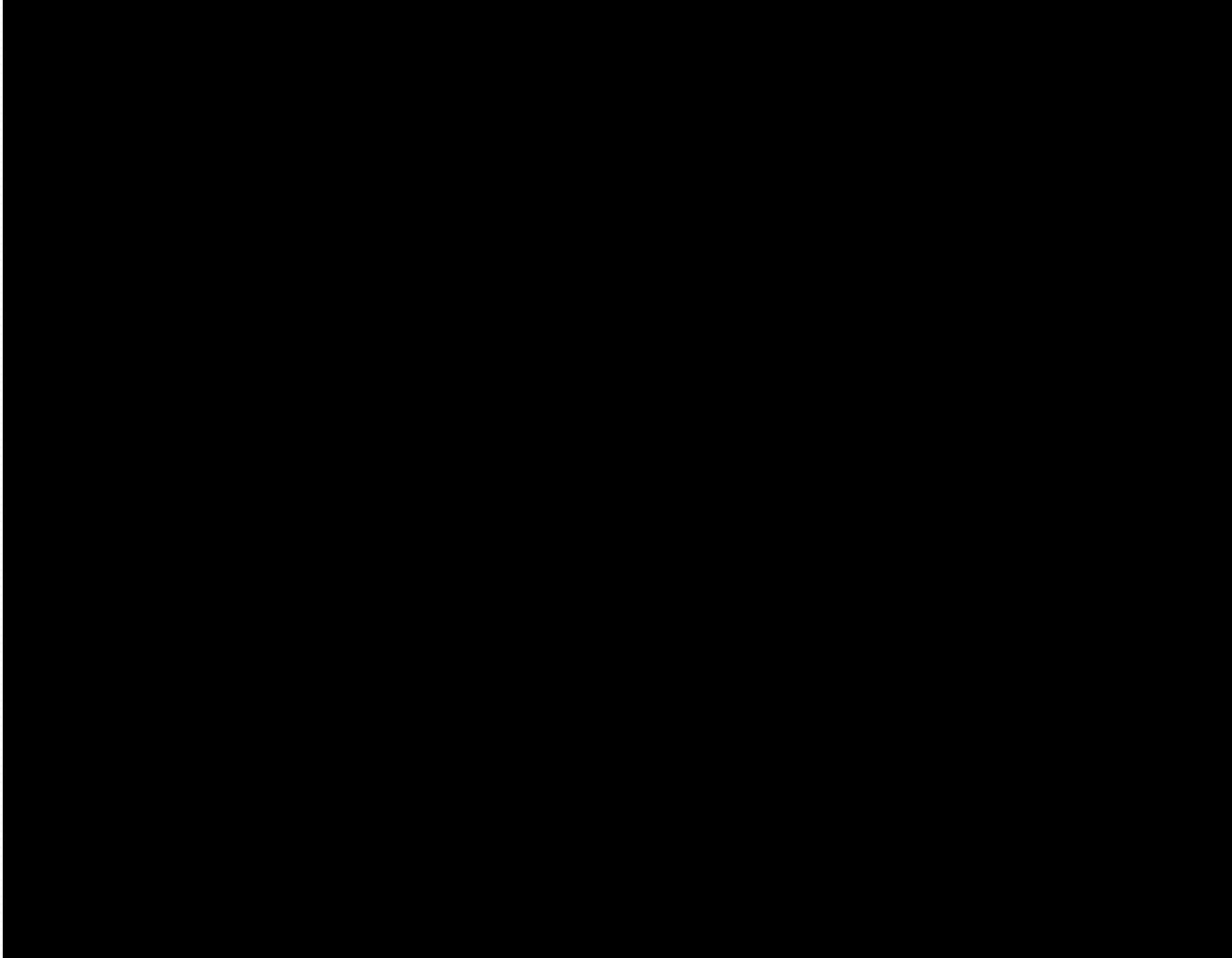




# SALIENT FEATURES OF ALUMINIUM FORMWORK



## PROPPING SYSTEM





# ADVANTAGES OF ALUMINIUM FORMWORK



## LIGHT WEIGHT BUT STRONG



AVERAGE WT 22 KG/M<sup>2</sup>

WITHSTAND 5 T/M<sup>2</sup>

MANUALLY HANDLED



# ADVANTAGES OF ALUMINIUM FORMWORK



## NEED ONLY SEMI SKILLED LABOURS







# ADVANTAGES OF ALUMINIUM FORMWORK



## MONOLITHIC POURING





# ADVANTAGES OF ALUMINIUM FORMWORK



## HOUSE KEEPING LOT EASIER





# SERVICES IN ALUMINIUM FORMWORK





# ALUMINIUM FORMWORK BRACKETS TO WORK FROM OUTSIDE





# FINISH IN ALUMINIUM FORMWORK NEEDS JUST 4 TO 5 MM SKIM COAT





# ADVANTAGES OF ALUMINIUM FORMWORK



SPEED - 4 DAY CYCLE

INTRODUCING PRODUCTION LINE APPROACH ON SITE  
CREATE TEAM FOR CORE TASKS  
WALL STEEL  
FORMWORK  
SLAB STEEL  
CONCRETE POURING



# PRODUCTION LINE APPROACH



## TEAM 1 - WALL STEEL





# PRODUCTION LINE APPROACH



## TEAM 2 – FORMWORK ERECTION







# PRODUCTION LINE APPROACH



## TEAM 3 - SLAB STEEL





# PRODUCTION LINE APPROACH



## TEAM 4 – CONCRETE POURING





# ADVANTAGES OF ALUMINIUM FORMWORK



## ACTIVITY CHART

DAY NUMBER	1	2	3	4	5	6	7	8	9	10	11	12
LOCATION/ACTIVITIES	LEVEL 1 WALLS + LEVEL 2 SLAB			LEVEL 3 WALLS + LEVEL 3 SLAB				LEVEL 4 WALLS + LEVEL 4 SLAB				
FLOOR SECTION A	Level 1 Wall + Level 2 Slab			Level 2 Wall + Level 3 Slab				Level 3 Wall + Level 4 Slab				
Start Cast Wall Deck & 1st Flr M.A.E	Wtd. Shed				Wtd. Shed				Wtd. Shed			
Shake Wall Formwork				Shake Wall				Shake Wall		Shake Wall		
Erect Wall Formwork		Erect Wall			Erect Wall				Erect Wall			
Shake Deck Formwork			Shake Deck		Shake Deck				Shake Deck			
Erect Deck Formwork		Erect Deck			Erect Deck				Erect Deck			
Deck Slab & 1st Flr M.A.E		Deck Slab			Deck Slab				Deck Slab			Deck Slab
Concrete Wall & Deck			Pour			Pour			Pour			Pour
Strip & Re-erect Props	Prop			Prop			Prop			Prop		
FLOOR SECTION B	Level 1 Wall + Level 2 Slab			Level 2 Wall + Level 3 Slab				Level 3 Wall + Level 4 Slab				
Start Cast Wall Deck & 1st Flr M.A.E	Wtd. Shed				Wtd. Shed				Wtd. Shed			
Shake Wall Formwork				Shake Wall				Shake Wall		Shake Wall		
Erect Wall Formwork		Erect Wall			Erect Wall				Erect Wall			
Shake Deck Formwork			Shake Deck		Shake Deck				Shake Deck			
Erect Deck Formwork		Erect Deck			Erect Deck				Erect Deck			
Deck Slab & 1st Flr M.A.E		Deck Slab			Deck Slab				Deck Slab			Deck Slab
Concrete Wall & Deck			Pour			Pour			Pour			Pour
Strip & Re-erect Props	Prop			Prop			Prop			Prop		
FLOOR SECTION C	Level 1 Wall + Level 2 Slab			Level 2 Wall + Level 3 Slab				Level 3 Wall + Level 4 Slab				
Start Cast Wall Deck & 1st Flr M.A.E	Wtd. Shed				Wtd. Shed				Wtd. Shed			
Shake Wall Formwork				Shake Wall				Shake Wall		Shake Wall		
Erect Wall Formwork		Erect Wall			Erect Wall				Erect Wall			
Shake Deck Formwork			Shake Deck		Shake Deck				Shake Deck			
Erect Deck Formwork		Erect Deck			Erect Deck				Erect Deck			
Deck Slab & 1st Flr M.A.E		Deck Slab			Deck Slab				Deck Slab			Deck Slab
Concrete Wall & Deck			Pour			Pour			Pour			Pour
Strip & Re-erect Props	Prop			Prop			Prop			Prop		
FLOOR SECTION D	Level 1 Wall + Level 2 Slab			Level 2 Wall + Level 3 Slab				Level 3 Wall + Level 4 Slab				
Start Cast Wall Deck & 1st Flr M.A.E	Wtd. Shed				Wtd. Shed				Wtd. Shed			
Shake Wall Formwork				Shake Wall				Shake Wall		Shake Wall		
Erect Wall Formwork		Erect Wall			Erect Wall				Erect Wall			
Shake Deck Formwork			Shake Deck		Shake Deck				Shake Deck			
Erect Deck Formwork		Erect Deck			Erect Deck				Erect Deck			
Deck Slab & 1st Flr M.A.E		Deck Slab			Deck Slab				Deck Slab			Deck Slab
Concrete Wall & Deck			Pour			Pour			Pour			Pour
Strip & Re-erect Props	Prop			Prop			Prop			Prop		





# ADVANTAGES OF ALUMINIUM FORMWORK



SPEED - 4 DAY CYCLE





# CARE TO BE TAKE WHILE USING ALUMINIUM FORMWORK



- **PROPER SETTING OUT**
- **ENSURE VERTICALITY OF FORMWORK**
- **APPLY GOOD RELEASING AGENT**
- **FIXING OF PINS & WEDGES & WALL TIES, VERTICAL SOLDIERS, BUILDING SPACERS**
- **KICKER BOLTS MUST BE SECURED PROPERLY**
- **DESHUTTER FORMWORK ON TIME**
- **PULL OUT WALL TIES IMMEDIATELY ON REMOVAL OF WALL PANELS**
- **CLEANING OF EDGE EVERYTIME YOU DESHUTTER**
- **MAINTAIN SMALL WORKSHOP AT SITE**



# WHY ALUMINIUM FORMWORK



- **EASE OF CONSTRUCTION**
- **MONOLITHIC CONSTRUCTION**
- **SPEED OF CONSTRUCTION**
- **QUALITY OF CONSTRUCTION**
- **ECONOMY**

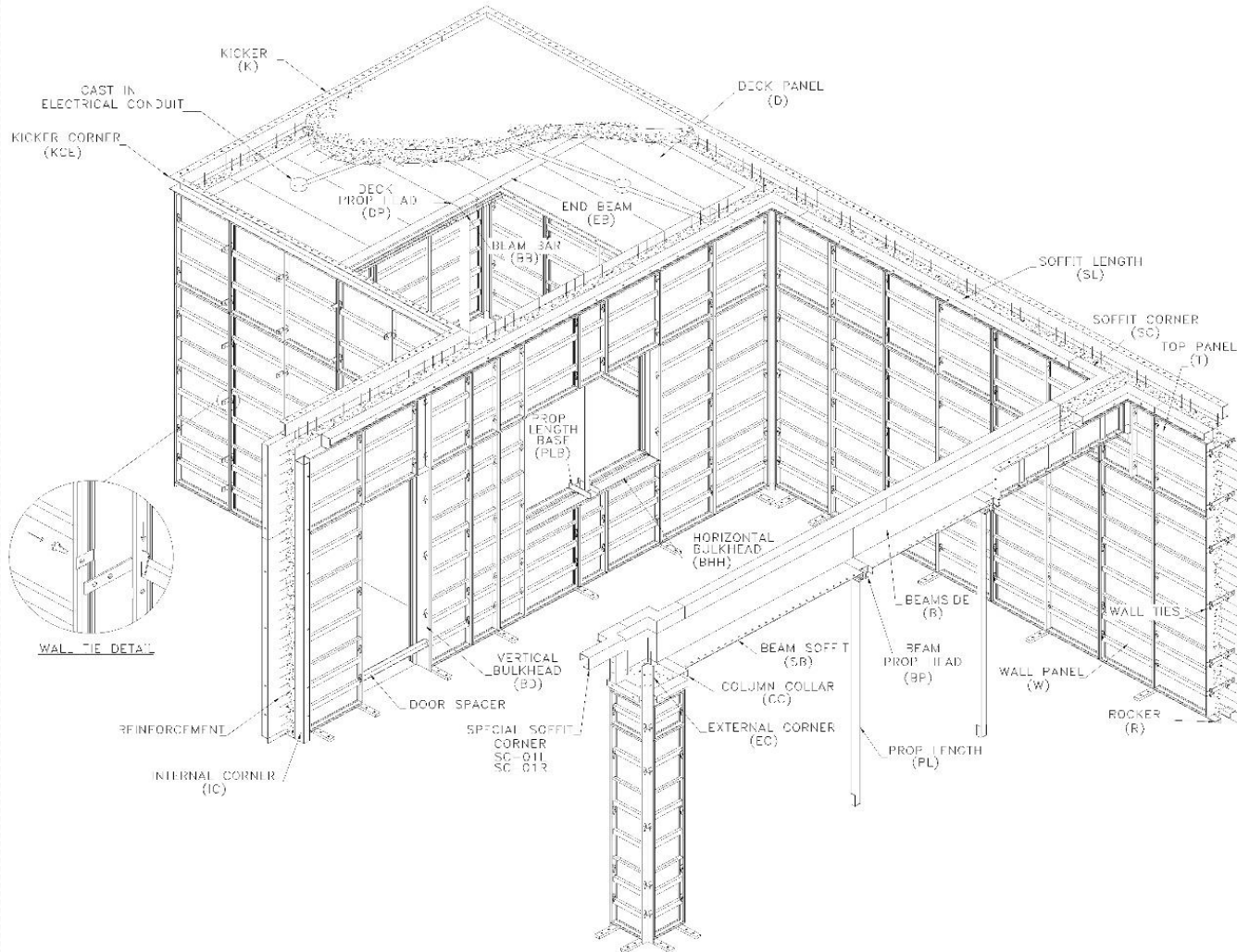




# SUITABILITY OF ALUMINIUM FORMWORK



## ALL KIND OF STRUCTURES





# ALUMINIUM FORMWORK IS SUITABLE FOR ALL SIZE OF PROJECTS



- **HIGHRISE MORE THAN 40 STOREY**



- **MID HEIGHT 10 TO 40 STOREY**



- **LOW RISE 3 TO 9 STOREY**



- **VILLAS GROUND TO 2 STOREY**

- **STANDALONE REHAB UNITS**



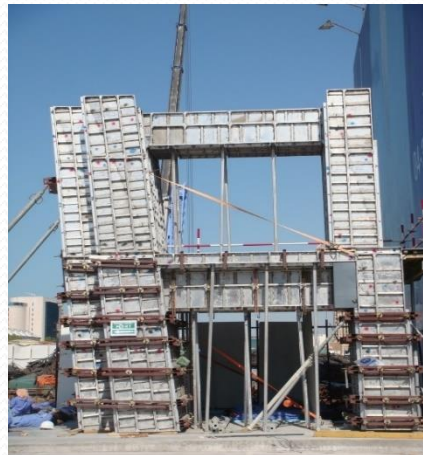


# ALUMINIUM FORMWORK FOR SPECIAL SHAPE STRUCTURES





# ALUMINIUM FORMWORK FOR ICONIC STRUCTURES

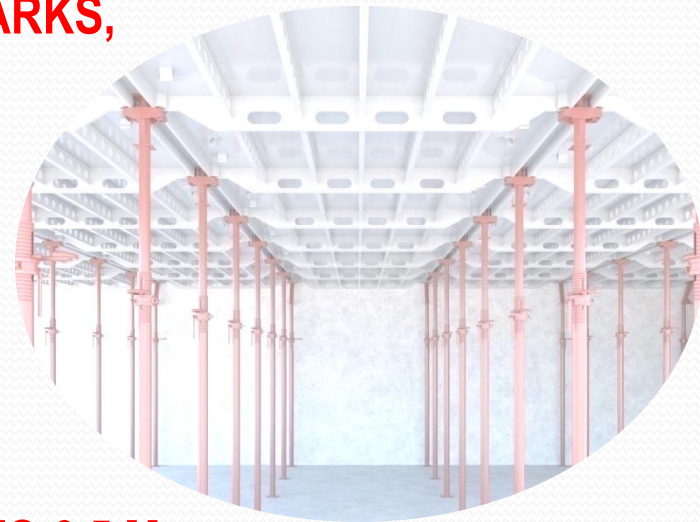




# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS



- **FOR COMMERCIAL BUILDINGS, CAR PARKS, PODIUM SLABS & BASEMENTS**
- **SLAB THICKNESS UP TO 650 MM**
- **CLEAR FLOOR TO FLOOR HEIGHT UP TO 6.5 M**





# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS



## ALL COMPONENTS

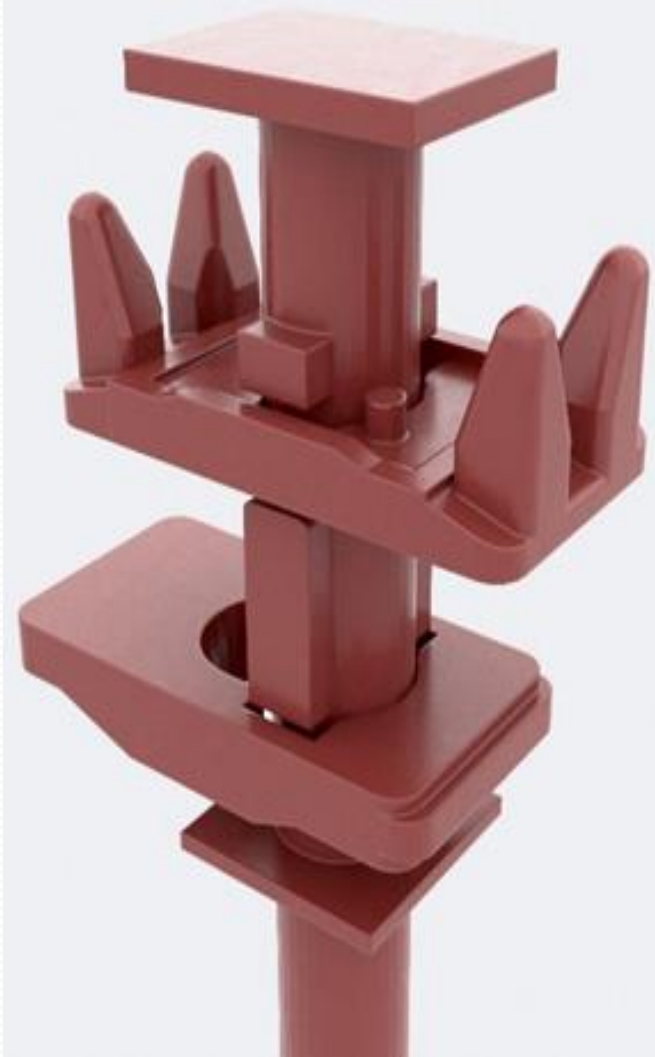




# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS



## MAIN COMPONENTS





# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS



## INSIDE VIEW





# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS



## INSIDE VIEW





# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS



PRODUCTIVITY 20 M2 PER MAN HOUR



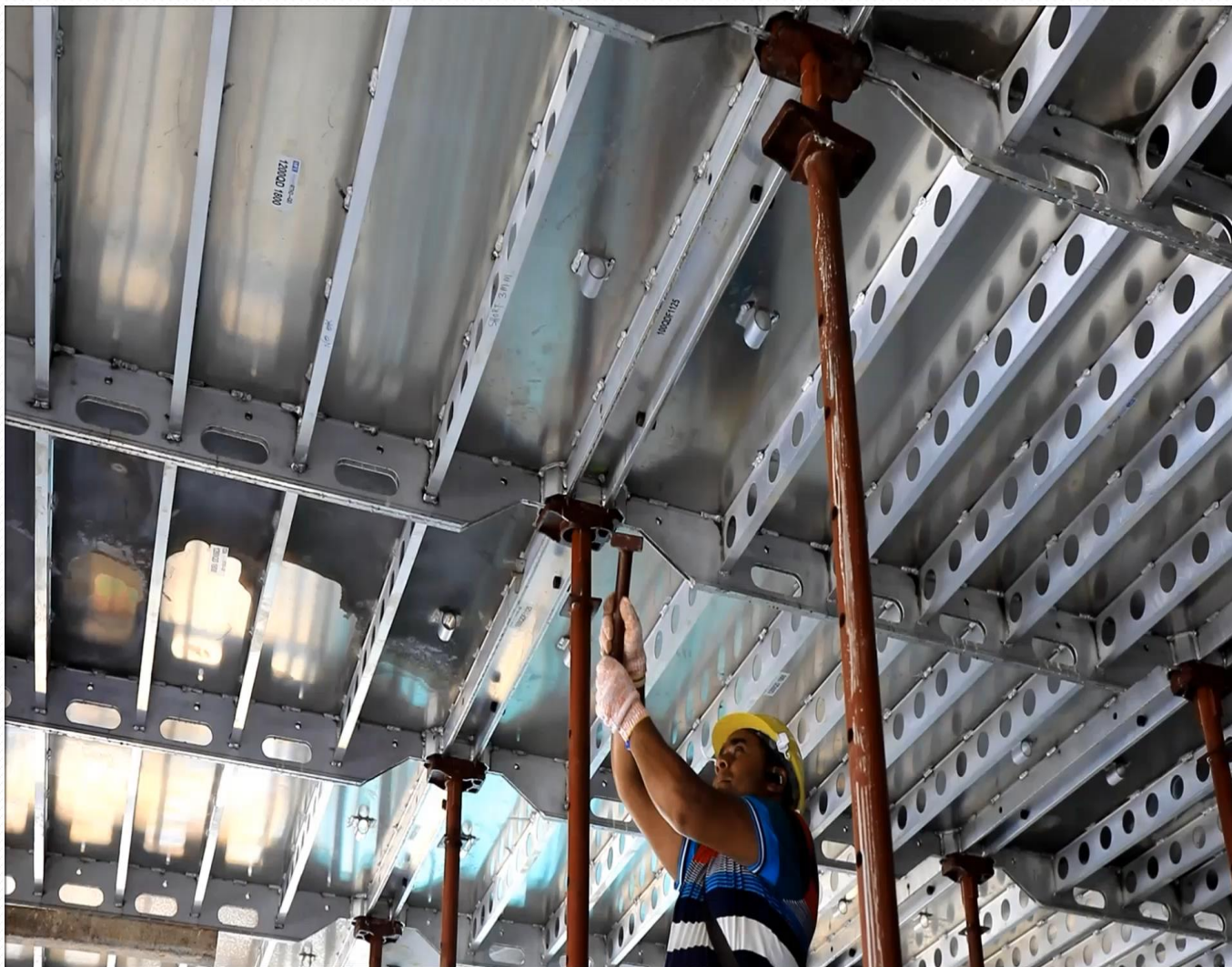




# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS



## DESHUTTERING



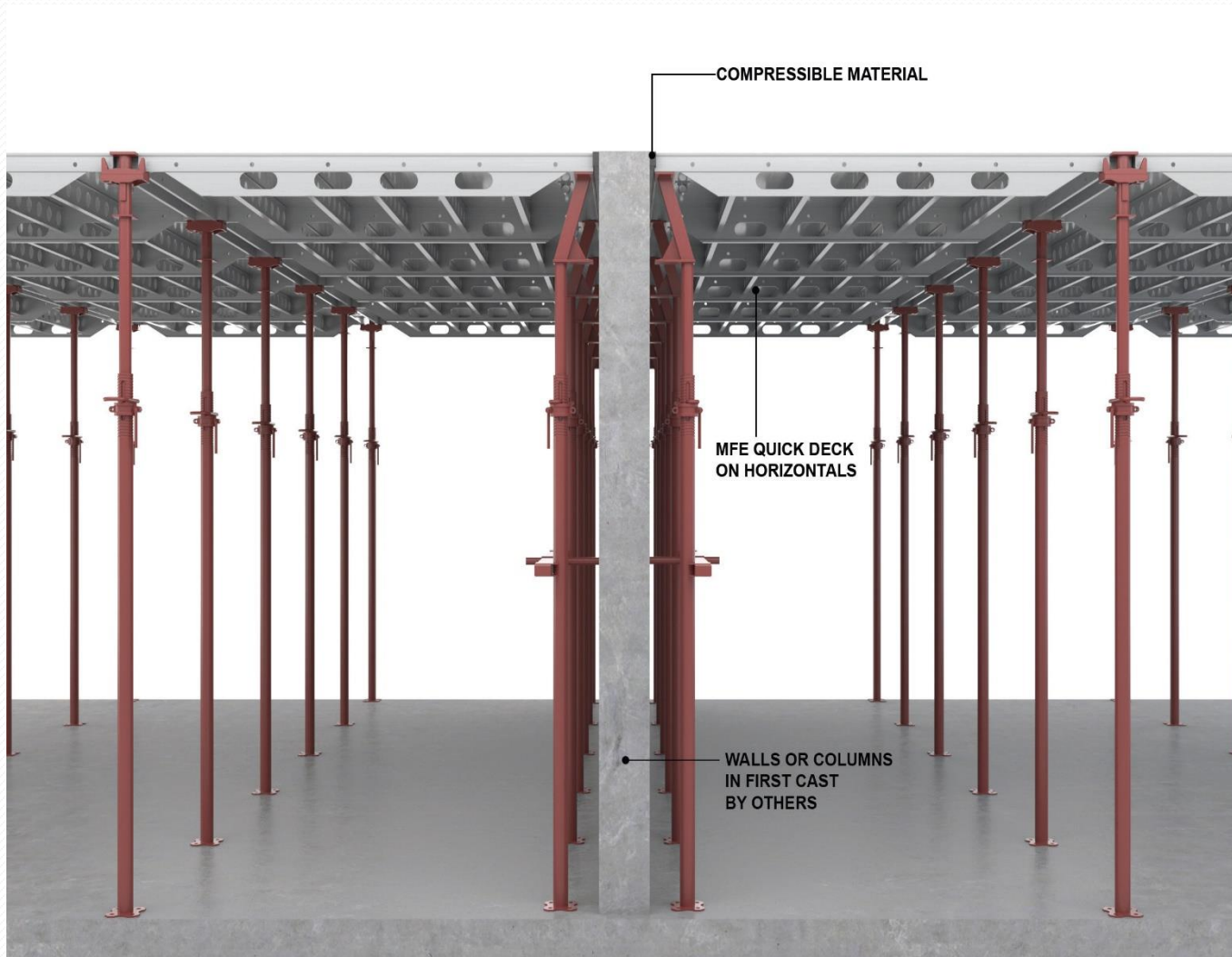


# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS INTEGRATED WITH VERTICAL ALUMINIUM FORMWORK





# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS 2<sup>ND</sup> CAST WITH TRADITIONAL FORMWORK





# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS 2<sup>ND</sup> CAST WITH TRADITIONAL FORMWORK

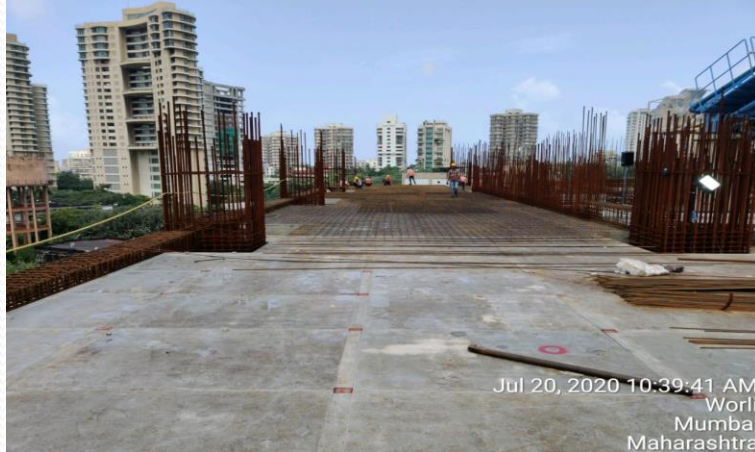




# QUICK DECK ALUMINIUM FORMWORK FOR LARGE SPAN SLABS

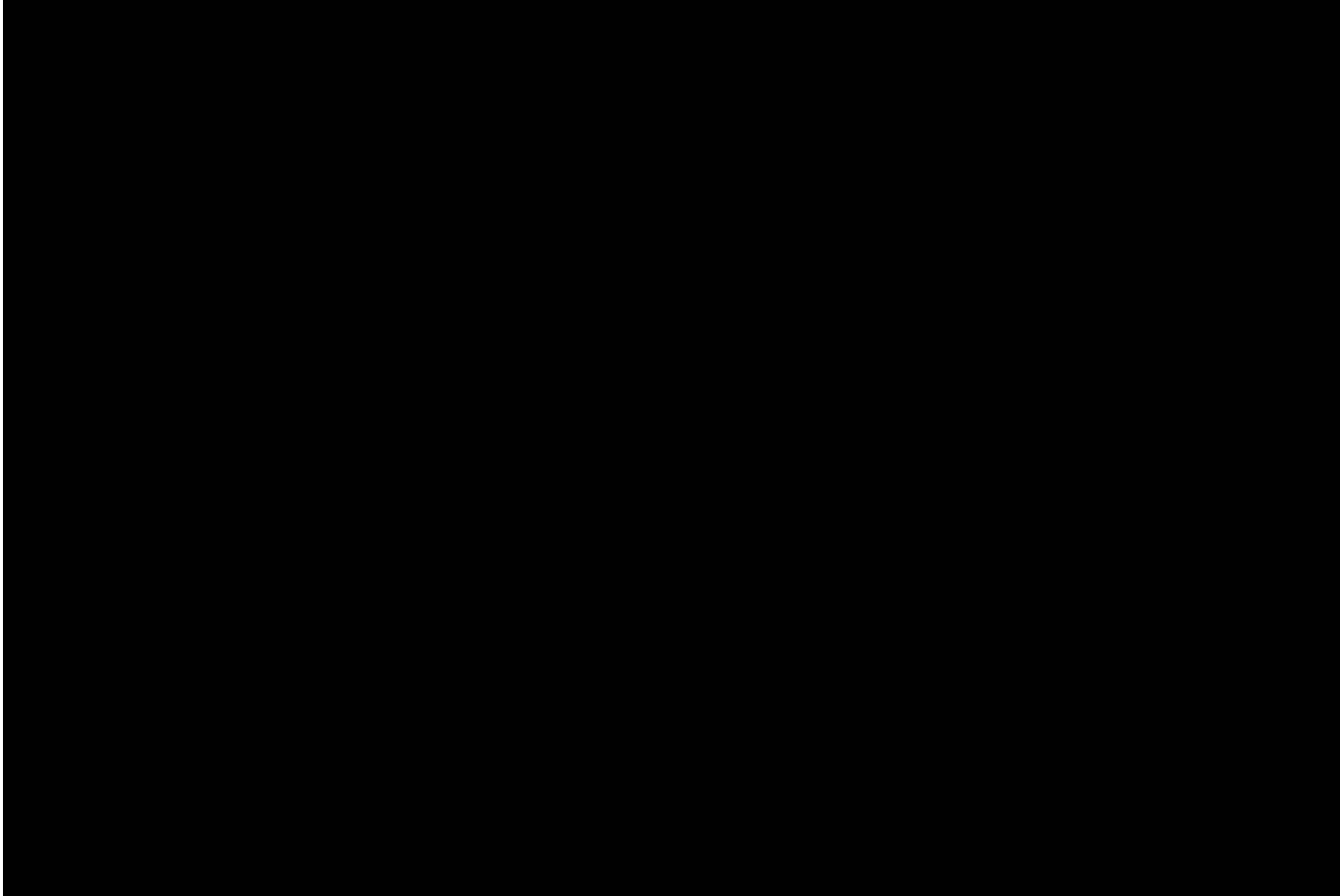


## ACTUAL PICTURES





# SITE PROCEDURES





THANK YOU