



ADVANCED DESIGN and DEATAILING ACADEMY

FRAMECAD IS PLEASED TO OFFER YOU THIS THREE DAY
TRAINING COURSE TO ENHANCE YOUR DESIGN AND
DEATAILING SKILLS IN LIGHT GAUGE STEEL FRAMING

Venue: FRAMECAD International FZE, 11th Floor, Jafza One - Tower A, Jebel Ali, Dubai, UAE



OBJECTIVE OF THE COURSE:

This three day best practise design & detailing training course is specifically designed to increase your knowledge of light gauge steel framing and help you design and detail durable and cost effective buildings and value engineer light gauge steel framing structures.

THE COURSE:

This 3-day training course covers the following topics (time permitting):

- Introduction to Steel Framing
- Design Criteria for Residential and Low-Rise Steel Framing Structures
- Roof System Components (analysis and design of trusses, roof panels, and battens)
- Wall System Components (structural performance and design of studs, lintels and plates)
- Floor System Components (actions, analysis and design of joists and bearers)
- Lateral Bracing (structural performance and design of wall/roof bracing systems)
- Fasteners and Connectors
- FRAMECAD Testing Results & Data of Inline Framing Screws
- Durability of Light Gauge Steel Structures
- Fabrication and Construction Practise
- Acoustic and Thermal Considerations
- Efficient Construction Details

REQUIREMENTS FROM ATTENDEES:

Attendees must, at a **minimum**, meet the following requirements:

- Engineering degree or practical engineering background
- Basic knowledge of light gauge steel structures (design and/or detailing)
- RSVP at least 2 weeks in advance by filling in the registration form
- Submit copy of their passport; 1 passport size photo and copy of UAE visa (if resident of UAE)

Kindly scan a copy of your passport and send it to Jonahl@framecad.com as soon as possible so a JAFZA gate pass can be secured ahead of time to avoid last minute delays. Please note that without an official JAFZA gate pass, you will not be granted access into the Jebel Ali Free Zone (JAFZA)

VISA Requirements:

Citizens of the GCC nations of Bahrain, Kuwait, Oman, Qatar and Saudi Arabia do not require a visa to travel to the UAE.

Citizens of other countries should check the link below to determine visa requirements:

http://www.visitdubai.com/en/travel-planning/travel-tools/visa-and-entry-information



Emirates Airline typically can process visa if ticket is booked on their airline. Please check with Emirates for cost and details.

You can also contact the travel agency that FRAMECAD uses to arrange for issuing the visa. The cost is approximately \$160 and will take only 3 working days (you deal directly with the travel agency as FRAMECAD does not endorse the agency or guarantee the visa issuance).

ACCOMMODATION:

FRAMECAD has corporate rates with the below hotels list. Please mention your tie with FRAMECAD when inquiring about your stay.

Holiday Inn Express**

Internet City

Ms. Chastine Ann Belarde
+971 4 427 5515
reservation@hiexdubai.ae

Gloria Hotel****
Tecom
Mr. Edgar Abou Nader +971
4 399 6666
edgar.abounader@gloriahotelsdubai.com

Premier Inn Ibn Batuta Gate *****,
Discovery Gardens
+97148850999
reservations@mena.premierinn.com

TRANSPORTATION:

Taxis are very regular along the streets of Dubai and are easy to spot. The easiest place to find them is at the taxi queue at one of the malls, close to a metro station or outside the airport or any hotel. All hotels in Dubai provide their guests with private taxi services that can be arranged from the main counter. The journey from Internet City where most of the hotels are strategically located takes from 20 to 30 minutes to FRAMECAD office depending on traffic. Please plan your journey ahead of time in order to arrive at FRAMECAD's office on time for the training class.

Carpooling can also be arranged at your request at very minimal cost from hotel to our JAFZA office and back



AGENDA – DAY 1:

8:30 AM – 9:30 AM Welcome and Introduction

Attendees

FRAMECAD

Course Agenda

9:30 AM – 10:30 AM Introduction to Light Gauge Steel (LGS)

Advantages of LGS

Sustainability Considerations

Design Codes and Standards

Material Properties (steel 350 and 550)

Corrosion Protection

10:30 AM – 10:45 AM Coffee/Tea Break

10:45 AM – 12:00 PM Imposed Design Actions and Load Combinations to AS/NZS1170.1

12:00 PM - 12:45 PM Lunch

12:45 AM – 3:15 PM Roof Systems

Design Considerations of Roof Structures

Type, Specifications and Design of Roof Battens

• Type, Specifications and Design of Ceiling Battens

Design and Spacing of Ceiling Joists

Type, Design and Spacing of Roof Trusses

Design and Detailing of Roof Panels

Roof Connections

3:15 PM – 3:30 PM Coffee Break 3:30 PM – 5:00 PM Wall Systems

Wall Framing Components

Structural Performance and Design of Wall Structures

• Design, Spacing and Placement of Wall Studs

 Type and Design of Lintels Beams (including lintel design on MyFRAMECAD)

Design of Heads and Sills

Wall Connections to Foundations and LGS floors

5:00 PM – 5:30 PM Questions and Answers



AGENDA – DAY 2:

8:30 AM – 9:00 AM Review of Day 1

9:00 AM - 10:00 AM Floor Systems

Flooring Components

Structural Performance and Design of Flooring

• Structural Components and Design of Floor Joists

 Floor Vibrations (requirements and minimum acceptable frequency in LGS flooring)

• Floor Connection Systems

10:00 AM – 10:15 AM Coffee Break

10:15 AM – 12:00 AM Bracing Systems

Introduction to Bracing Systems

 Structural Performance and Design of Roof Bracing (bottom and top chords)

• Wall Bracing (type of lateral resisting systems)

• Shear Walls (bracing methods)

Flexible VS Rigid Diaphragms

Bracing Connections (sheathing to frame, diaphragm to wall,

wall to wall and wall to foundation)

12:00 PM - 12:45 PM Lunch

12:45 – 3:15 PM Fasteners and Connectors

Introduction

Screws

Rivets

Clinches

Bolts

FRAMECAD Screws

FRAMECAD Connectors

Simpson Connectors

3:15 PM – 3:30 PM Coffee Break

3:30 PM – 5:00 PM FRAMECAD Test Results & Data of Inline Framing Screws

5:00 PM – 5:30 PM Questions and Answers



AGENDA – DAY 3:

8:30 AM – 9:00 AM Review of Days 1 and 2

9:00 AM – 10:30 AM Fabrication and Construction Practise

 Fabrication Systems (material identification and construction tolerance in assembly and erection)

Safety (temporary bracing and electrical)

Transportation and Storage of LGS Framing

Service Holes in LGS Framing

10:30 AM – 10:45 AM Coffee Break

10:45 AM – 12:15 PM Thermal Considerations

 FRAMECAD Building Products (Fibre Cement, Gypsum Board, Glass Wool, Magnesium Board and Building Wrap)

 FRAMECAD Common Sub-Assemblies (R Value and Fire Rating)

12:15 PM – 1:00 PM Lunch

1:00 PM – 2:30 PM Standard and Efficient Construction Details

Wall Panels

Webbed Joists

Roof Trusses

2:30 PM – 2:45 PM Coffee Break

2:45 PM - 4:30 PM Case Study

Analysis & Loads

Modelling

Capacities & Calculations

· Construction Details

Structural Drawings Format

Shop Drawings

4:30 PM – 5:00 PM Questions and Answers

5:00 PM – 5:30 PM Review and Certificates



FC INTERNATIONAL – ENGINEERING TEAM

Eng. Nader Elhajj – Business Development Director – FRAMECAD Methods

Nader is a structural engineer with over 30 years of design and construction experience, he is a registered Professional Engineer and holds a MS degree in Structural Engineering and an MBA. Nader comes from a multi-cultural background and speaks Arabic and English. He has been closely affiliated with several light gauge steel associations around the world.

Eng. Baider H Baker – Design Engineer

Baider is a Chartered Civil/Structural Engineer. Having completed his Bachelor's degree from the University of Auckland in New Zealand he possesses extensive experience in HR Steel Structures, multi span bridges, pre-stress design, timber structures, foundations and CFS Structures. Baider has worked on multi-million dollar projects in New Zealand, Australia and the Middle East. Baider speaks English and Arabic.

Eng. Ashley Fransman – Design Engineer

Ashley is a Chartered Civil/Structural Engineer. Having completed his Bachelor's degree from the University of Peninsula technology in South Africa, he possesses extensive experience in HR Steel Structures, RC structures, timber structures, foundations and CFS Structures. Ashley has worked on multi-million dollar projects in South Africa, United Kingdom, South America and the Middle East. Ashley speaks English and Afrikaans.

FC INTERNATIONAL – SALES TEAM - DUBAI:

Mr. Henry Haddad – Systems Sales Manager

Henry comes from a multi-cultural background and speaks Arabic, English and French. He has a degree in commerce with an emphasis on International Business and has 7 years working experience with FRAMECAD Systems in both New Zealand and the Middle East. Henry possesses deep knowledge and extensive experience in Light Gauge Steel manufacturing solutions and manages a wide customers' database in the region.

Mr. Lee Canfield – Building Products Business Development Manager

Lee has been working directly for globally renowned sanitary ware manufacturers for over 13 years. He relocated to Dubai 6 years ago, as a Business Development Manager to develop franchises, agency and trade business throughout the GCC, MENA and Africa markets for multiple European brands; Lee joined FRAMECAD in 2014 as Business Development Manager, responsible for our Building Materials Division.

Mr. Amit Likhite – Steel Business Development Manager

Amit has over 16 years of business experience of which 10 years spent in the GCC in developing steel business and sales for various steel production companies. He holds a master degree in Marketing



Management from Preston College. Amit joined FRAMECAD in 2014 and has been working since on developing FRAMECAD steel products supply chain.

FC INTERNATIONAL – TECHNICAL TEAM – DUBAI:

Mr. Ericson Pia – Client Services – Technical Support

Eric is Electronic and Communication by trade and holds a Trade Qualification in Electronics & Communication Engineering. He has 8 years' experience in FRAMECAD Roll Forming machines— He has also been exposed to developing and setting up of LGS system, installation & commissioning of steel roll forming line, Lamination line as well as Aftersales Support of all FRAMECAD roll-forming equipment. Ericson is originally from Philippines but has worked as senior Maintenance Engineer in the GCC for 9 years though started his time with FRAMECAD in May 2015.

Mr. Jayson Mercado – Client Services – Technical Support

Jayson has over 7 years' experience in Roll Forming machines and has also been exposed to setting up of LGS system, installation & commissioning of steel roll forming line. With a background of BSIT major in Instrumentations and Control Engineering Technology, he has worked as Machine Operator/Supervisor/Procurement in the GCC for 7years. Jayson started with FRAMECAD in 2014 Aftersales Support in machine commissioning, servicing as well as spare parts sale and coordination.