Catalytic Reforming Fundamentals

Catalytic reforming has always been a key refining process for the production of high-octane motor gasoline as well as for aromatic petrochemicals. This process is also a prolific hydrogen producer which is extremely important in today’s clean fuels environment. Optimum performance coupled with long run lengths is necessary in the current environment.

This course covers all aspects of this process, including overviews, process flows and chemistry, catalysts, equipment, and proper operation. The class has a practical, operational focus that is suitable for unit engineers, supervision and operators, both experienced and inexperienced.

What You Will Learn

Overview
  • Why reforming?
  • History of the process
  • About naphtha and PONA
  • About octane and RVP
  • About hydrogen
  • Volume gain and loss
  • Refinery BFD review: how reforming fits in
  • Unit economics review
  • Product specifications and properties

Process Chemistry
  • Aromatics formation
  • Isomerization
  • Hydrocracking
  • Heat effects
  • Dual functional catalysts
  • Coke formation

Process Fundamentals & PSM
  • Reforming technologies
  • Important process variables
  • Five step flow diagram review
  • Hydrogen generation and purification
  • Operating conditions
  • Catalyst regeneration
  • Process safety issues

Process Equipment
  • Reactors and internals
  • Feed preheat exchangers
  • Furnaces
  • Debutanizers (stabilizers)
  • Compressors
  • Regeneration systems

Operations & Technical Service
  • Performance evaluations
  • Feed qualities and effects
  • Feed contaminates and effects
  • Reformate color
  • Catalyst performance
  • Hydrogen purity
  • Equipment performance aspects

Course Information

April 30–May 1, 2014

Class starts at 8:00am and finishes at 5:00pm both days. The program includes breakfast, lunch, and coffee/tea breaks. Attendees also receive a class manual that can serve as a valuable office reference. Dress code is casual.

Your Instructor

Barry Robinson is Sr. Staff Engineer with Middough Inc., a Midwest engineering and construction firm. He has over 37 years of experience in the petroleum refining industry in various technical and managerial positions. He has extensive experience in major capital project design and execution, as well as refinery operations, training, and turnaround execution.

He has a strong technical and operating background in fluid catalytic and thermal cracking processes, along with their associated feed preparation and product separation units. He has experience in hydrotreating/catalytic reforming operations as well.

He holds a BSChE from The Ohio State University and MBA from Bowling Green.
Course Fees

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<th>Course Pass includes</th>
<th>Reception and Exhibition on Wednesday evening</th>
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<td><strong>Early</strong> (ends March 21, 2014)</td>
<td>$1,375</td>
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<td><strong>Regular</strong></td>
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Early Registration Ends March 21, 2014

Payment
Due prior to the start of the training by Visa, Master Card, American Express, bank wire transfer or corporate check. Training fees will be charged to your credit card at the time of registration unless other arrangements have been made. Make checks payable to “Coking.com Inc.”

Refund Policy
Fees are fully refundable until April 7, 2014 (three weeks before the event), after which a $200 fee will be charged for cancellations. Registering for this course prior to April 7, 2014 will help maximize the probability that the course will proceed as planned. Cancellations after April 21, 2014 (1 week before class until 24 hours before class) are charged a 50% fee. All other cancellations and no-shows are non-refundable. Substitutions are allowed. All cancellations and transfers need to be submitted in writing, by email or by fax.

Please contact us for more information on Refining Community policies.

Hotel Information

Moody Gardens Hotel and Convention Center
7 Hope Boulevard
Galveston, Texas 77554
Phone (888) 388-8484
MoodyGardensHotel.com

Mention RefComm to receive a special room rate when you book your reservation with Moody Gardens

REGISTER NOW
regonline.com/RefCommGalveston

We want you to be safe and reliable

We bring together the Coker and CatCracker operator and reliability technicians, process and mechanical engineers, inspectors, supervisors, suppliers, and EPCs to learn from each other’s expertise and improve productivity while lowering the risk.

Join the Refining Community!
RefiningCommunity.com

The Coking & CatCracking Conference is now

REFCOMM

This is our 25th conference and we invite you to be part of the success!

Beginning in 2001 we have hosted training and conferences all over the world with an emphasis on safety:
More production – less risk.

Schedule of events and other classes offered at RefComm during the week of April 28 – May 2, 2014

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<td>Alkylation Fundamentals</td>
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<td>Delayed Coker Operations &amp; Reliability</td>
<td>Coker Process, Design, &amp; Troubleshooting</td>
<td>Mechanical Integrity Management of Coke Drums</td>
<td>FCCU Operations Fundamentals</td>
<td>FCCU Process &amp; Recent Developments</td>
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<td>Hydrotreating Fundamentals</td>
<td>Understanding Fixed Equipment Integrity</td>
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Exhibition Tuesday 5:00pm – Thursday 7:00pm