# Excel VBA Programming for Chemical Engineers (CH766VTL)
*Virtual Course*

10:00 – 11:30[1]  Session 1
Getting Started with VBA
- Configuring Excel for VBA programming
- The Visual Basic Editor environment
- Recording and editing macros
- Debugging in the Visual Basic Editor

12:00 – 1:30  Session 2
User-Defined Functions
- Programming user-defined functions (UDFs)
- Including programming structure in UDFs
- Borrowing Excel spreadsheet-based functions
- Developing array functions
- Packaging collections of functions in an Excel add-in

2:30 – 4:00  Session 3
Delving into VBA Programming
- Communicating with the spreadsheet
  - Object-oriented concepts
- Data types and scope
- VBA programming structures
- Modular organization of VBA programs

4:30 – 6:00  Session 4
User Interfaces and VBA Applications
- Message boxes, input boxes and on-sheet buttons
- Programming event handlers
- Designing and creating userforms
- Integrating course concepts into an Excel VBA application
- Interfacing with external programs

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[1] Note:  Times given are Eastern time zone.