



## Introduction to Gridding for Computer-based Subsurface Mapping

### MODULE

#### About the Skill Module

In the modern petroleum industry, contour maps are generally derived from grids created in interpretation software packages. Maps, or the grids themselves, are used to evaluate prospectivity, estimate prospect volumes, pick drilling locations, and are the inputs for basin models, and static reservoir models. Despite the importance of these maps and the underlying grids, there is often a poor understanding of how the grids are generated and what the implications may be for the final map. This module introduces the gridding process and how manipulation of basic gridding parameters can produce maps that more closely reflect the underlying geology.



## Target Audience

Geoscientists, engineers, geoscience technicians, and anyone who needs to generate subsurface maps or understand how these maps are generated.

## You Will Learn

You will learn how to:

The importance of subsurface mapping

- How subsurface maps are used in the petroleum industry
- Why mapping correctly matters
- How mapping should be incorporated into an interpretation project

The basics of contouring

- Contouring rules
- Different contouring styles
- Practice contouring by hand

The basics of gridding

- What a grid is
- Why grids are necessary
- How gridding works
- Geometric gridding parameters & their impact on the output grid
  - Increments
  - Extents
  - Orientation
- Grid search parameters & their impact on the output grid
  - Search radius/ellipse
  - Anisotropy (directional weighting)
- Grid smoothing or filtering & its impact on the output grid
  - How, when, and why it may be applied
  - Common smoothing function

## Product Details

Categories: Upstream

Disciplines: Geology

Levels: Basic

Product Type: Individual Skill Module

Format: On-Demand

Duration: 2 hours (approx.)

**\$250.00**