

## Manufacturing sequence Study

For Small Modular Reactors and Advanced Reactors Components

Framatome analyses component design for feasibility, manufacturability and optimization.

### Challenge

- Identify and justify manufacturing feasibility
- Determine manufacturing sequences
- Identify design optimization option
- Supply chain analysis

### Solution

With more than 60 years of experience in nuclear island components manufacturing, Framatome has the most comprehensive capabilities to determine the best approach to manufacture a component from design documents.

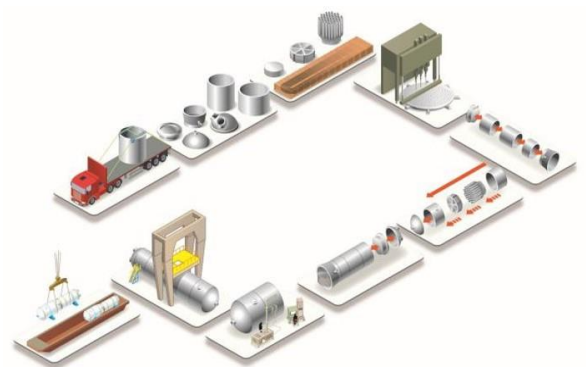
Framatome is thus able to identify and justify feasibility, identify complex areas for the manufacturing processes and determine the most efficient manufacturing sequence:

- Propose and create a manufacturing sequence by identifying the different sub-assemblies with the experience and past projects feedbacks.
- Determine manufacturing sequences with the most important operations for each sub-assembly up to the assembly of the final product.
- Create a supply compendium identifying the needed parts which need sourcing to manufacture the components. Evaluate the sourcing feasibility (forgings especially).
- Identification of complex welding operations (joints, coating, buttering ...) and associated processes to be used.
- Release a manufacturing compendium which identifies weld markers, the processes applied, the filler products, the thicknesses, and the examinations needed in respect to the codes and customer's requirements.

### Customer benefits

- Derisk projects by justifying manufacturing feasibility
- Decrease cost uncertainty by providing manufacturing sequences and supply compendium
- Allow design optimization
- Shorten lead-time for component manufacturing
- Enter the industrialization phase

**Your performance**  
is our everyday **commitment**



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### Technical Informations & Key Figures

Framatome's expertise extends to the design and construction of 106 reactors in 11 countries, including the European Pressurized Reactor (EPR) new builds.

More than 675 heavy components have been manufactured by Framatome Boilermaking and Assembly Plant.

More than 310 Reactor Coolant Pumps and more than 6000 Control Rod Drive Mechanisms have been designed and manufactured by Framatome .

More than 3000 forgings and castings have been delivered by Framatome Forge.

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