

Compressible Flow in a Nozzle - Verification

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[Problem Specification](#)

- [1. Pre-Analysis & Start-Up](#)
- [2. Geometry](#)
- [3. Mesh](#)
- [4. Physics Setup](#)
- [5. Results](#)
- [6. Verification & Validation](#)

Verification

The Mach number contour confirms that the behavior at the outflow is supersonic. To sufficiently validate the results from the simulation, the maximum Mach number must be compared to the value from the pre-analysis. The maximum value from the simulation is shown in the **Summary** section of the **Mach Number** results panel. Table (1) compares the pre-analysis value to the value from the simulation. The percent difference confirms that the simulation result is very accurate, within 5% of the hand calculation.

Pre-Analysis Value	Simulation Value	Percent Difference
4.15	4.0353	2.8%

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