

|                                 | <b>Inlet</b> |             | <b>Compressor</b> |              | <b>Burner</b> |             | <b>Turbine</b> |  | <b>Nozzle</b> |
|---------------------------------|--------------|-------------|-------------------|--------------|---------------|-------------|----------------|--|---------------|
|                                 | 0            | 2           | 3                 | 4            | 5             | 8           |                |  |               |
| <b>M</b>                        | 0.8          | 0.5         | 0.31751208        | 1            | 1             | 1           |                |  |               |
| <b>P</b>                        | 30000        | 38551.43574 | 705656.807        | 559910.41    | 123945.12     | 94543.08613 |                |  |               |
| <b>T</b>                        | 230          | 247.0857143 | 612.7271723       | 1011.1111111 | 647.1111111   | 778.6321183 |                |  |               |
| <b>P<sub>t</sub></b>            | 45730.20029  | 45730.20029 | 719884.8129       | 719884.8129  | 178963.3645   | 178963.3645 |                |  |               |
| <b>T<sub>t</sub></b>            | 259.44       | 259.44      | 625.081458        | 1300         | 934.358542    | 934.358542  |                |  |               |
| <b>ρ</b>                        | 0.456065673  | 0.545540361 | 4.0268028         | 1.936215204  | 0.669706544   | 0.424552524 |                |  |               |
| <b>a</b>                        | 303.4666374  | 314.5363572 | 495.3140012       | 636.2773679  | 509.0218943   | 558.3585767 |                |  |               |
| <b>U</b>                        | 242.7733099  | 157.2681786 | 157.2681786       | 636.2773679  | 509.0218943   | 558.3585767 |                |  |               |
| <b>mdot<sub>corrected</sub></b> |              | 35          |                   | 4.976927847  |               | 16.97248073 |                |  |               |
| <b>mdot</b>                     | 16.46305094  | 16.46305094 | 16.46305094       | 16.46305094  | 16.46305094   | 16.46305094 |                |  |               |
| <b>Area</b>                     | 0.148690081  | 0.191885685 | 0.025996154       | 0.013363192  | 0.048293571   | 0.069448953 |                |  |               |