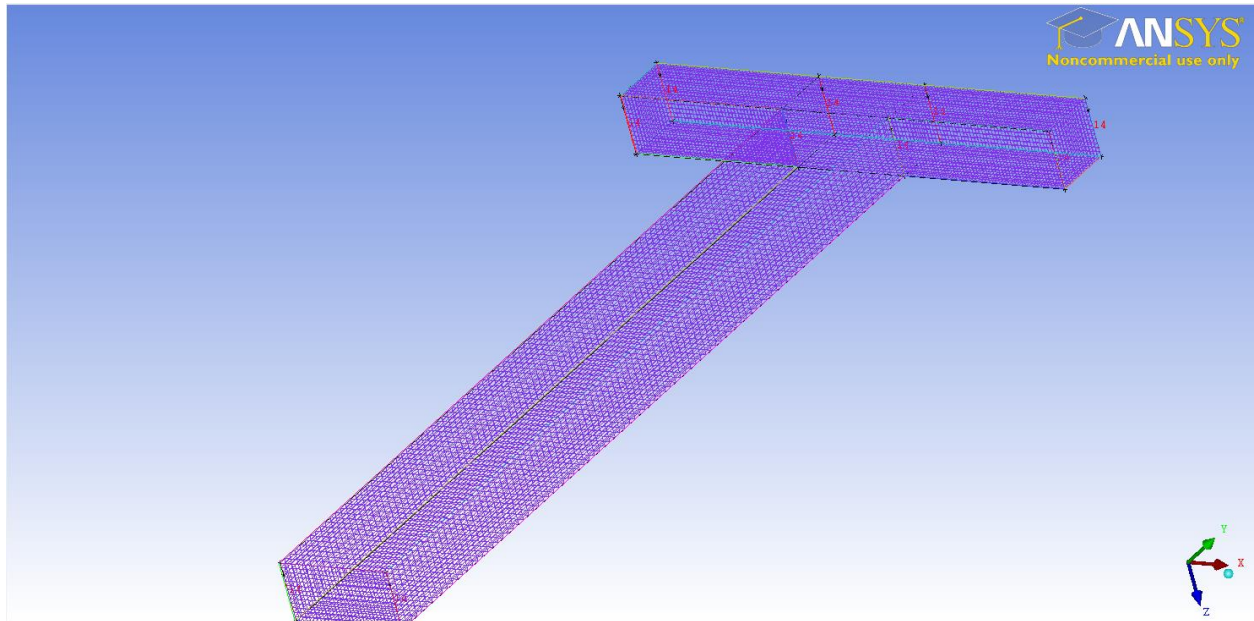
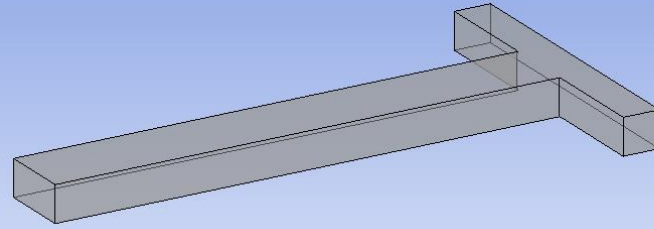
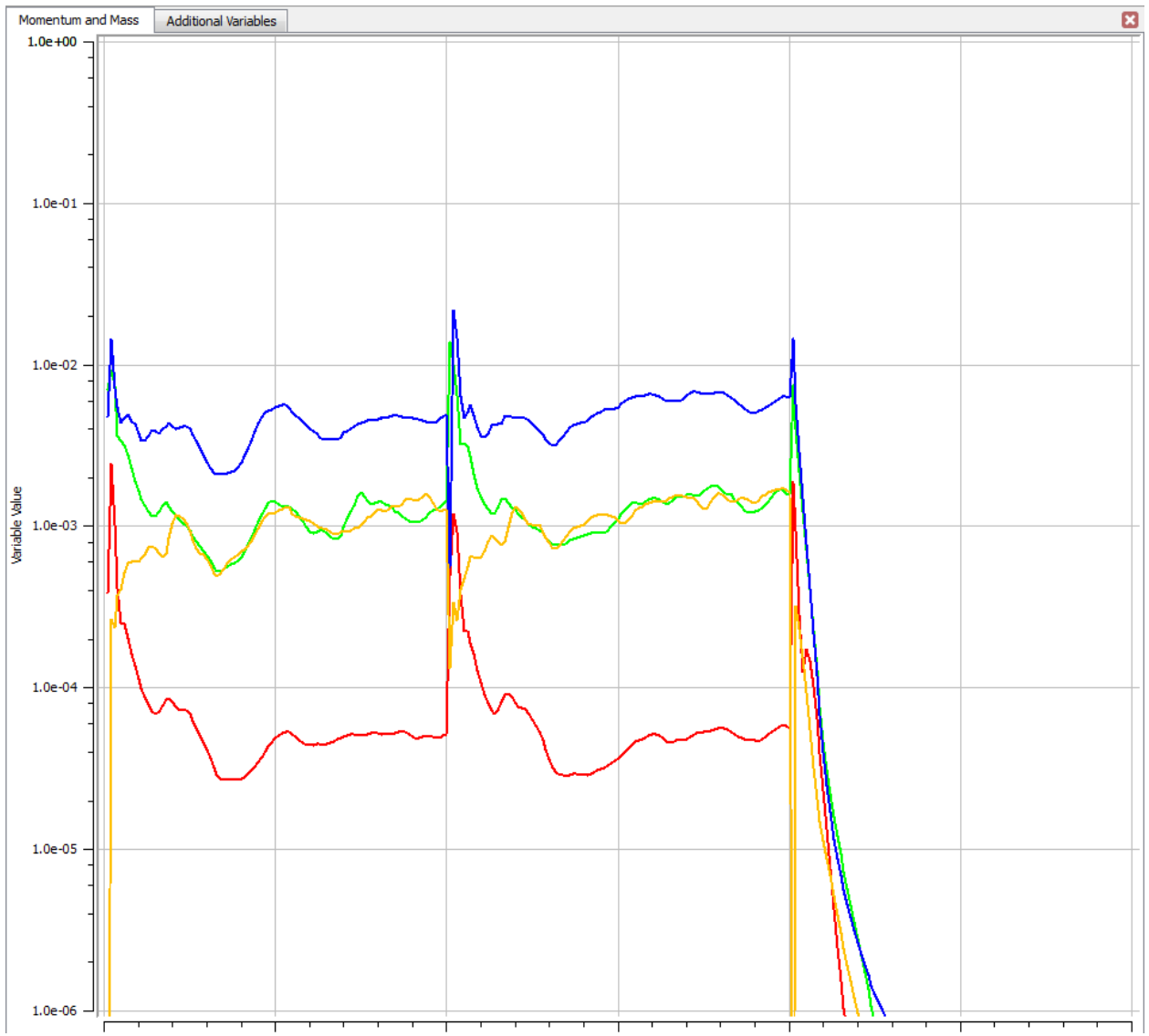


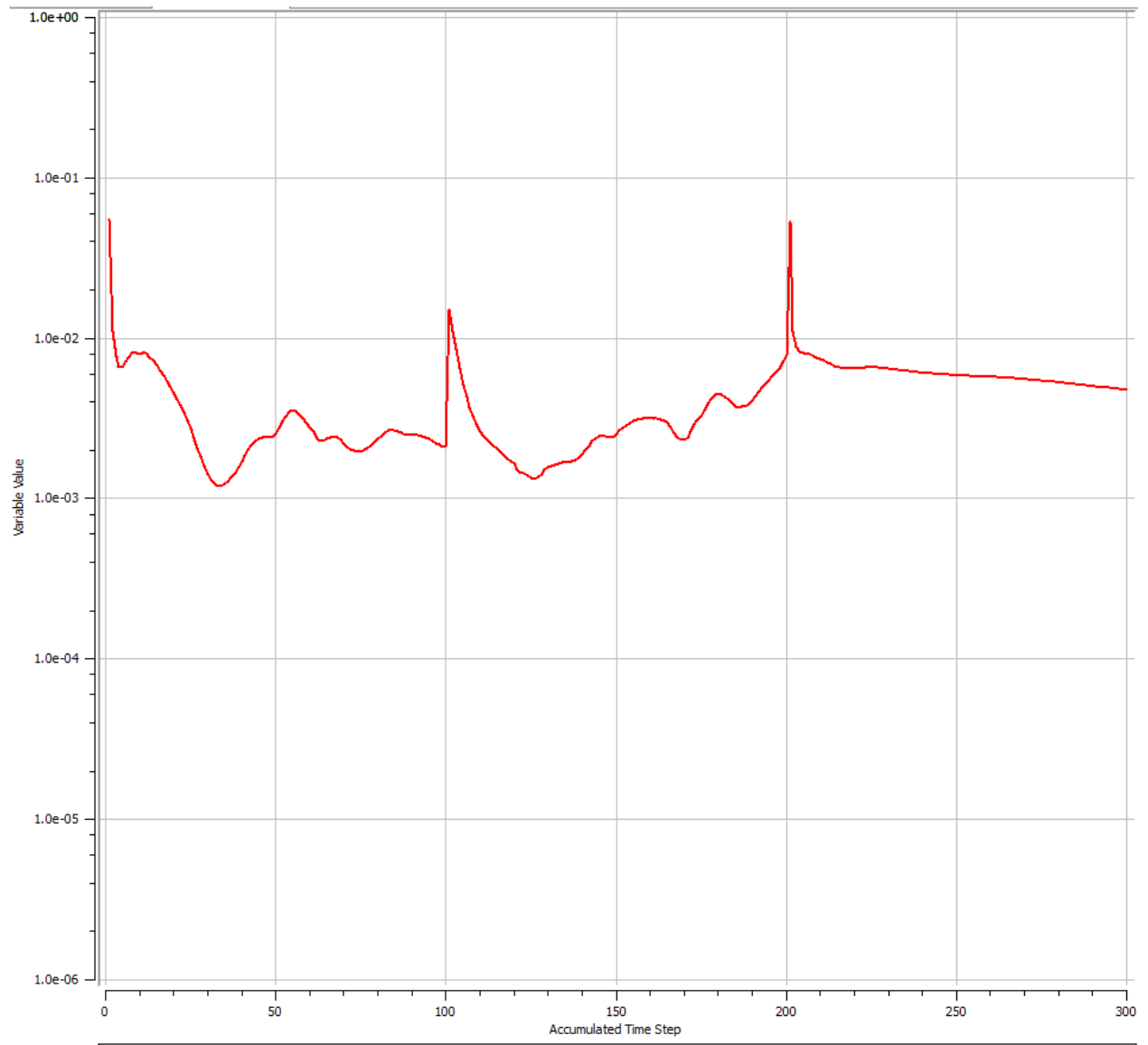
Mesh size:
nodes = 66668
quads = 15258
hexas = 58786





TASK 1





```

+-----+
|                               |
|                               |
|                               |
+-----+

```

Average Scale Information

Domain Name : Default Domain

```

Global Length           = 3.3011E-04
Minimum Extent          = 1.0000E-04
Maximum Extent          = 1.5000E-03
Density                 = 9.9700E+02
Dynamic Viscosity       = 8.8990E-04
Velocity                = 1.7677E-01
Advection Time          = 1.8674E-03
Reynolds Number         = 6.5376E+01

```

```

+-----+
|                               |
|                               |
|                               |
+-----+

```

Variable Range Information

Domain Name : Default Domain

```

+-----+
|                               |
|                               |
|                               |
+-----+

```

Variable Name	min	max
Tracer	-3.70E-13	1.00E+00
Density	9.97E+02	9.97E+02
Specific Heat Capacity at Constant Pressure	4.18E+03	4.18E+03
Dynamic Viscosity	8.90E-04	8.90E-04
Thermal Conductivity	6.07E-01	6.07E-01
Static Entropy	0.00E+00	0.00E+00
Velocity u	-3.34E-01	3.34E-01
Velocity v	-3.49E-01	3.40E-02
Velocity w	-3.42E-02	3.43E-02
Pressure	-6.40E-01	5.64E+02
Temperature	2.98E+02	2.98E+02

```

+-----+
|                               |
|                               |
|                               |
+-----+

```

Basic Settings
Material Properties

Option General Material ▾

Thermodynamic Properties ⊞

Equation of State ⊞

Option Value ▾

Molar Mass 18.02 [kg kmol⁻¹]

Density 997.0 [kg m⁻³]

Specific Heat Capacity ⊞

Option Value ▾

Specific Heat Capacity 4181.7 [J kg⁻¹ K⁻¹]

Specific Heat Type Constant Pressure ▾

Reference State ⊞

Option Specified Point ▾

Ref. Temperature 25 [C]

Reference Pressure 1 [atm]

Reference Specific Enthalpy ⊞

Ref. Spec. Enthalpy 0.0 [J/kg]

Reference Specific Entropy ⊞

Ref. Spec. Entropy 0.0 [J/kg/K]

Transport Properties ⊞

Dynamic Viscosity ⊞

Option Value ▾

Dynamic Viscosity 8.899E-4 [kg m⁻¹ s⁻¹]

Thermal Conductivity ⊞

Option Value ▾

Thermal Conductivity 0.6069 [W m⁻¹ K⁻¹]

Radiation Properties ⊞

Buoyancy Properties ⊞

Option Value ▾

Thermal Expansivity 2.57E-04 [K⁻¹]

Electromagnetic Properties ⊞

Basic Settings Fluid Models Initialization

Heat Transfer ☐

Option

Fluid Temperature

Turbulence ☐

Option ⋮

Combustion ☐

Option

Thermal Radiation ☐

Option

Electromagnetic Model ☐

Additional Variable Models ☐

Additional Variable ☐

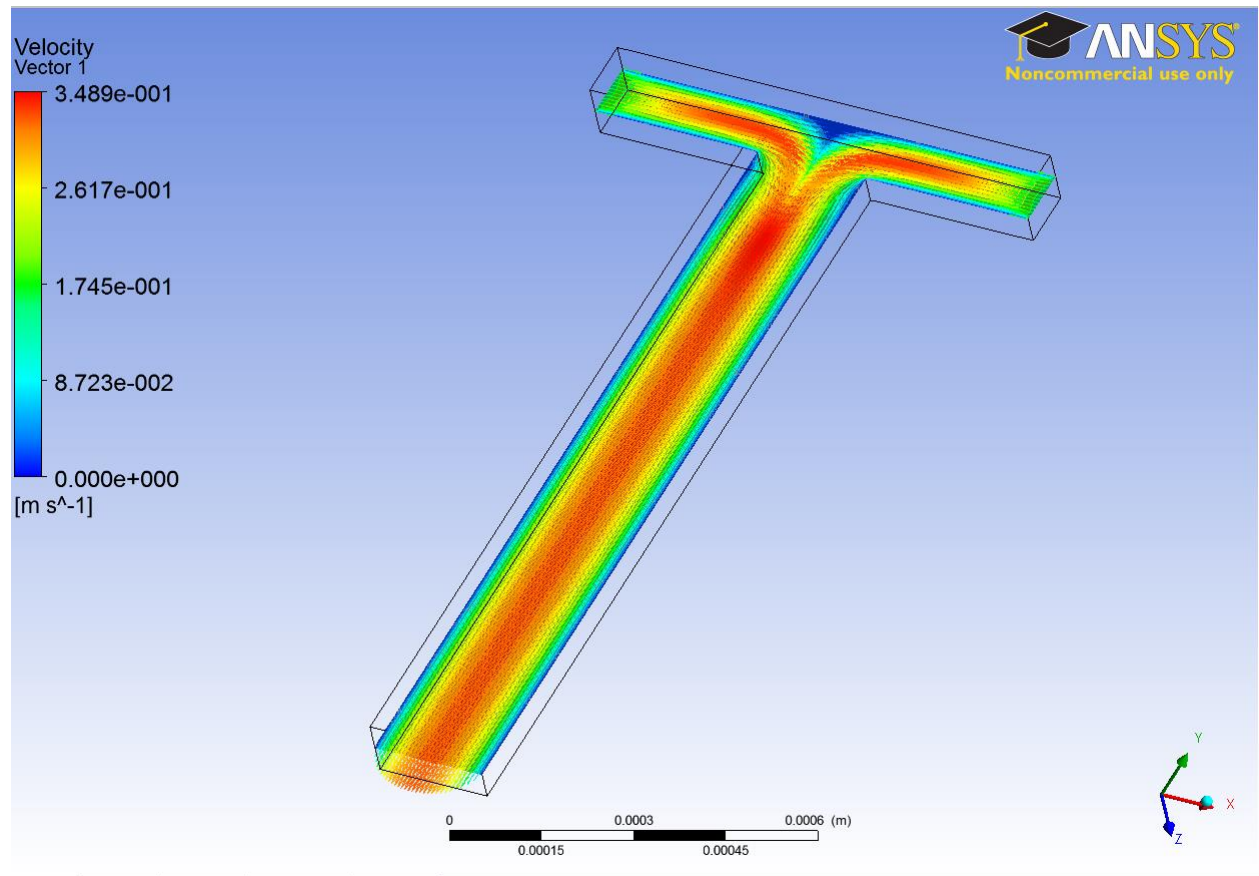
Tracer ☐

Option

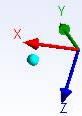
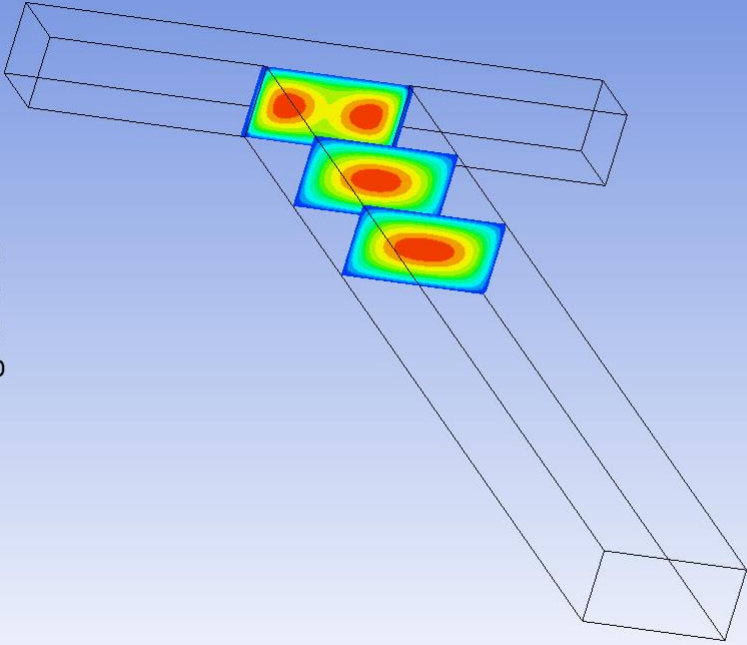
Kinematic Diffusivity ☐

Kinematic Diffusivity

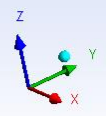
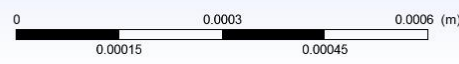
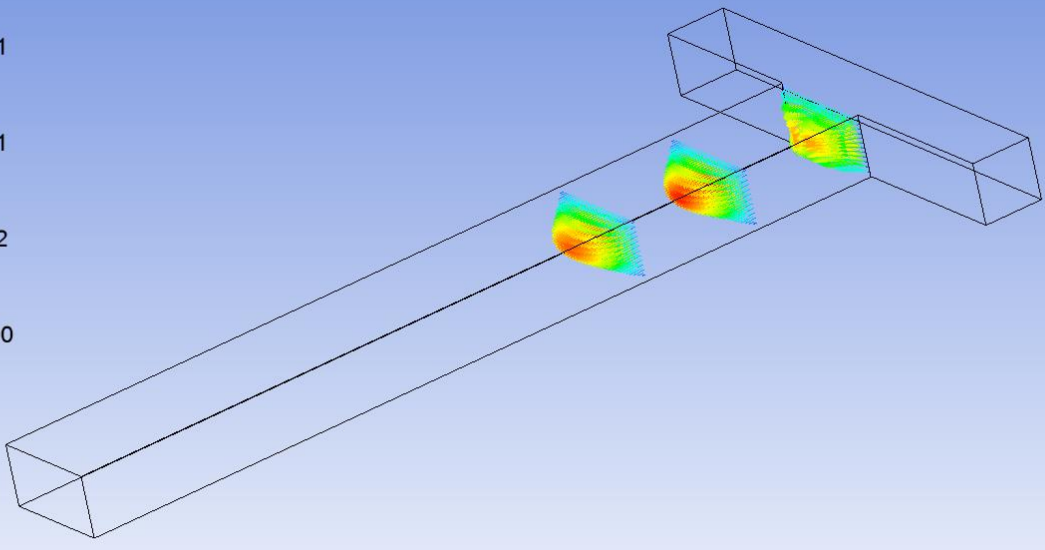
Z=0.05m

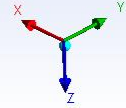
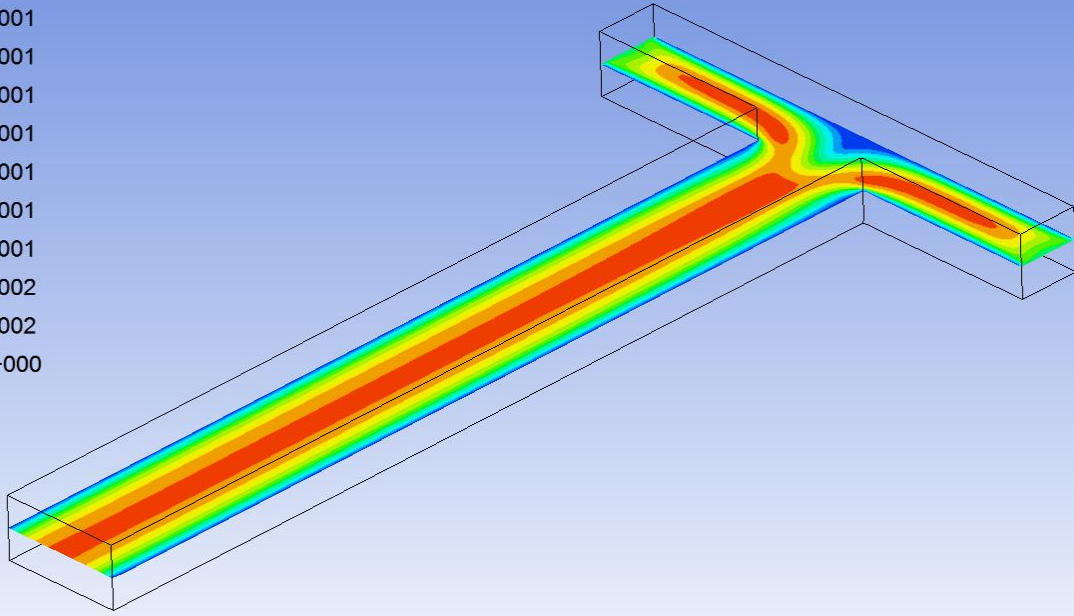
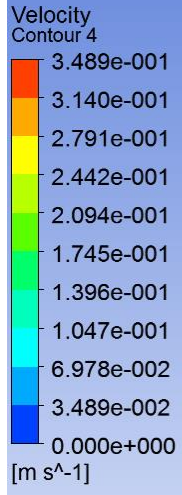


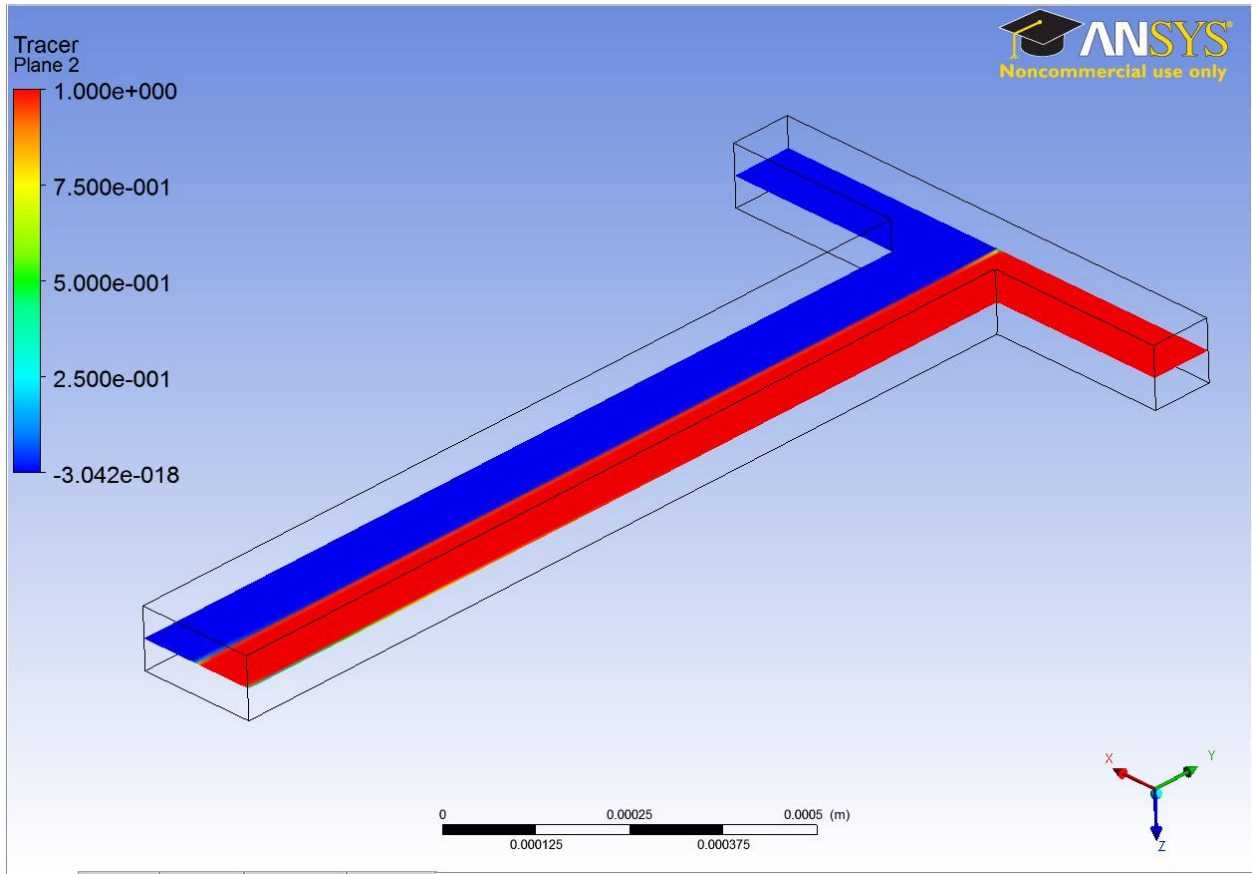
Velocity
Contour 3
3.239e-001
2.915e-001
2.592e-001
2.268e-001
1.944e-001
1.620e-001
1.296e-001
9.718e-002
6.479e-002
3.239e-002
0.000e+000
[m s⁻¹]



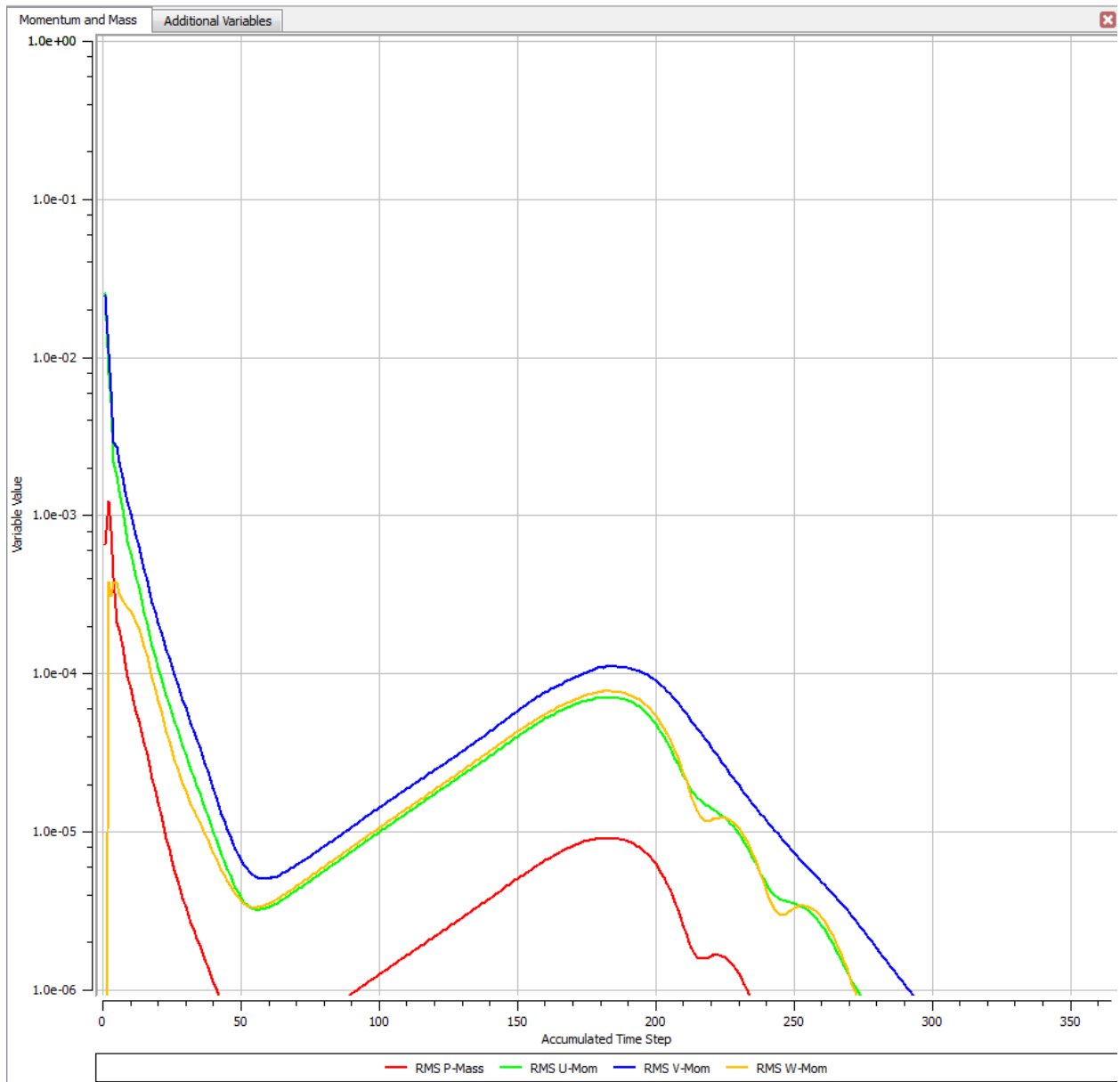
Velocity
Vector 3
3.489e-001
2.617e-001
1.745e-001
8.723e-002
0.000e+000
[m s⁻¹]







Task 2



```

+-----+
|           Average Scale Information           |
+-----+

```

```

Domain Name : Default Domain
  Global Length           = 3.3011E-04
  Minimum Extent          = 1.0000E-04
  Maximum Extent          = 1.5000E-03
  Density                 = 9.9700E+02
  Dynamic Viscosity       = 8.8990E-04
  Velocity                = 2.6244E+00
  Advection Time          = 1.2579E-04
  Reynolds Number         = 9.7059E+02

```

```

+-----+
|           Variable Range Information           |
+-----+

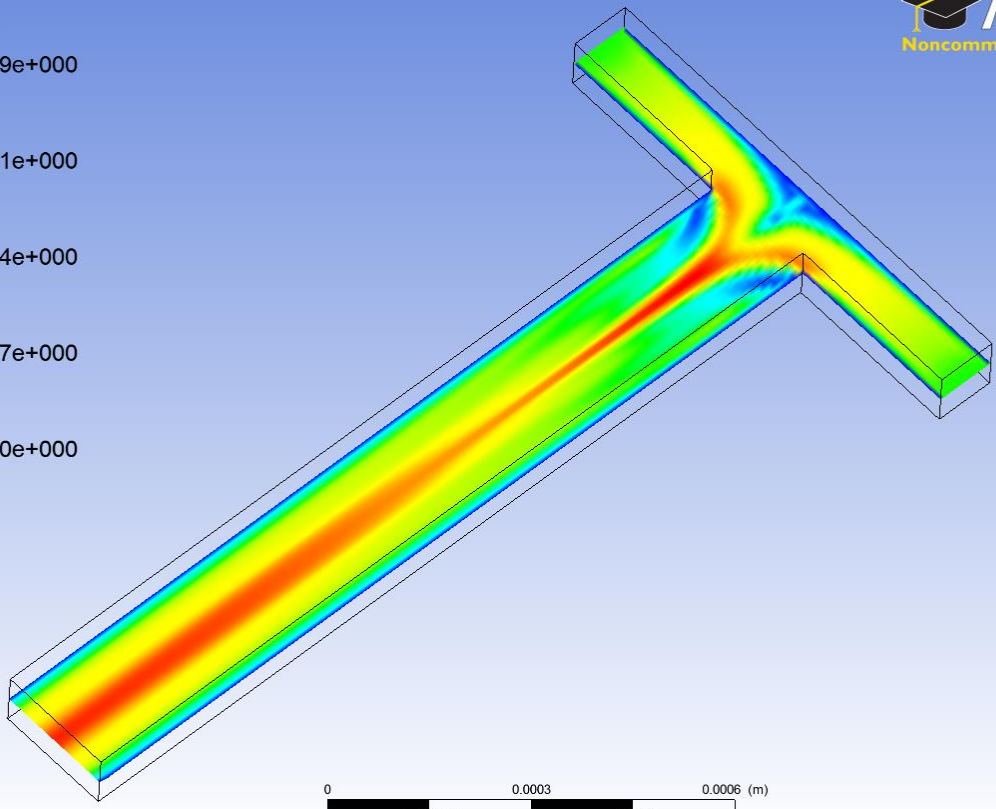
```

```

Domain Name : Default Domain
+-----+
| Variable Name           | min   | max   |
+-----+
| Tracer                  | -3.46E-16 | 1.00E+00 |
| Density                 | 9.97E+02 | 9.97E+02 |
| Specific Heat Capacity at Constant Pressure | 4.18E+03 | 4.18E+03 |
| Dynamic Viscosity       | 8.90E-04 | 8.90E-04 |
| Thermal Conductivity    | 6.07E-01 | 6.07E-01 |
| Static Entropy          | 0.00E+00 | 0.00E+00 |
| Velocity u              | -4.25E+00 | 4.25E+00 |
| Velocity v              | -4.91E+00 | 1.47E+00 |
| Velocity w              | -1.99E+00 | 1.98E+00 |
| Pressure                | -6.69E+01 | 1.74E+04 |
| Temperature             | 2.98E+02 | 2.98E+02 |
+-----+

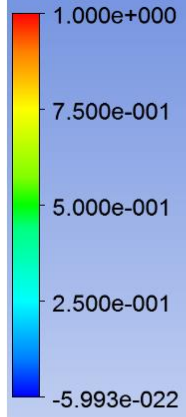
```

Velocity
Plane 2
4.909e+000
3.681e+000
2.454e+000
1.227e+000
0.000e+000
[m s⁻¹]

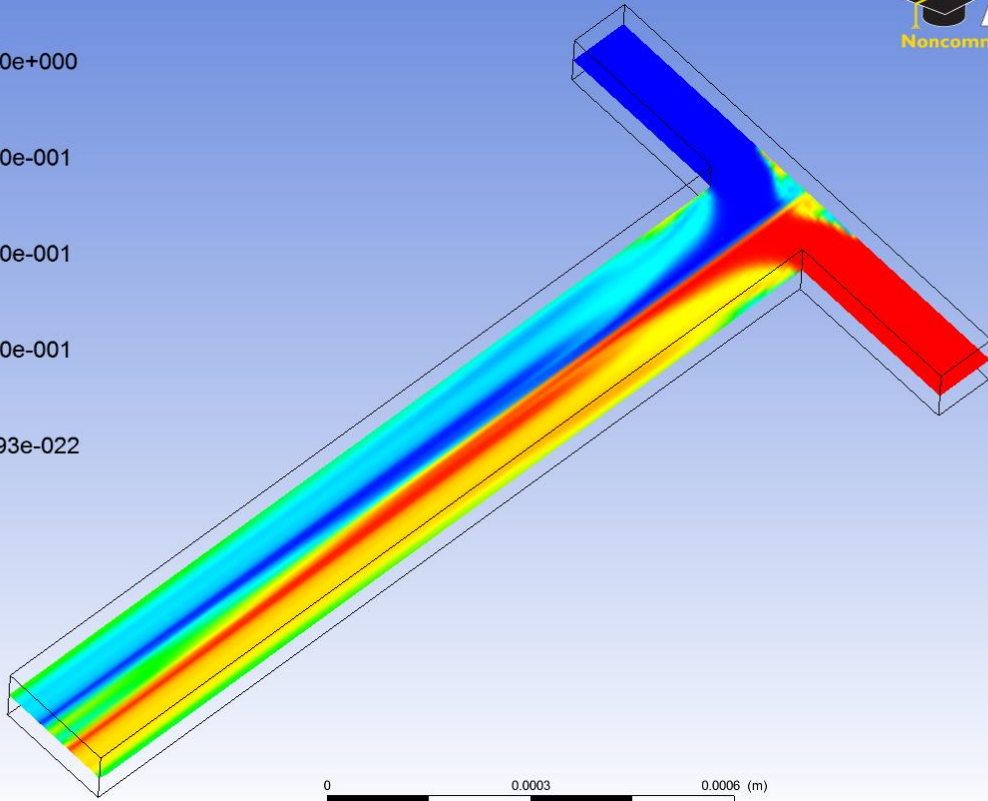


0 0.0003 0.0006 (m)
0.00015 0.00045

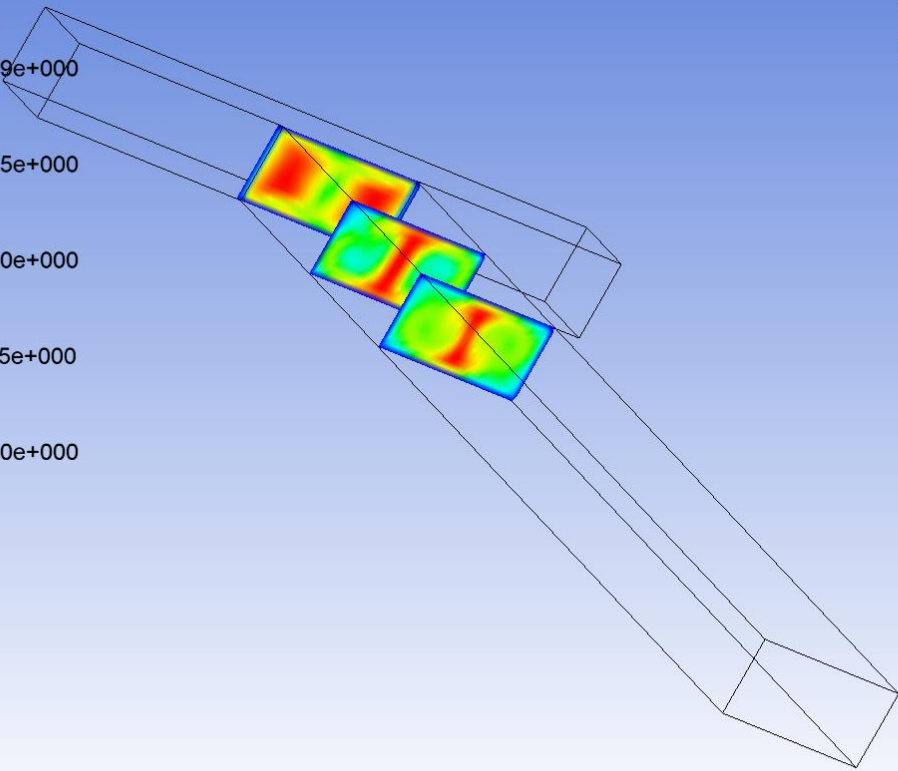
Tracer
Plane 2



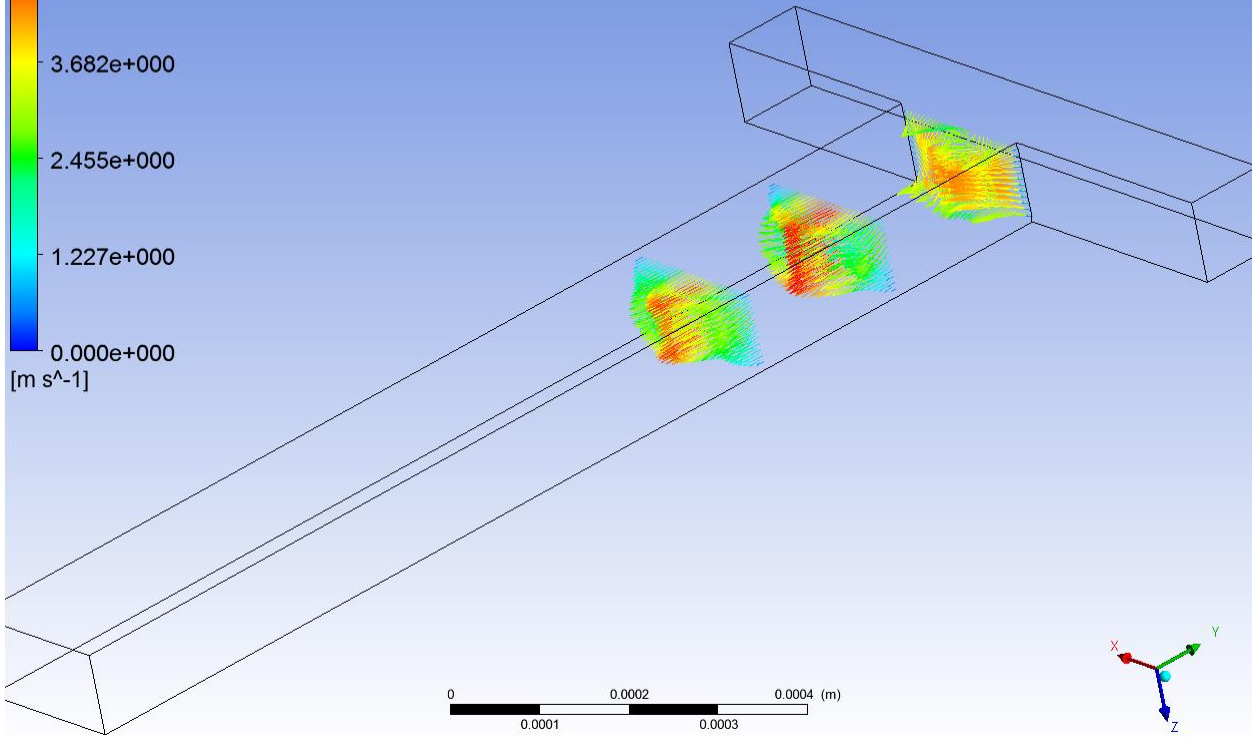
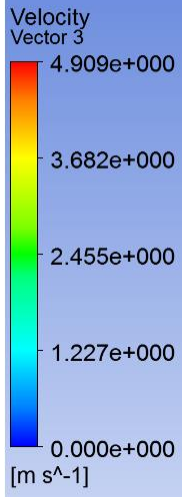
1.000e+000
7.500e-001
5.000e-001
2.500e-001
-5.993e-022



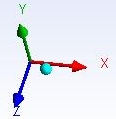
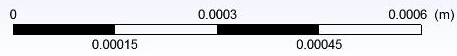
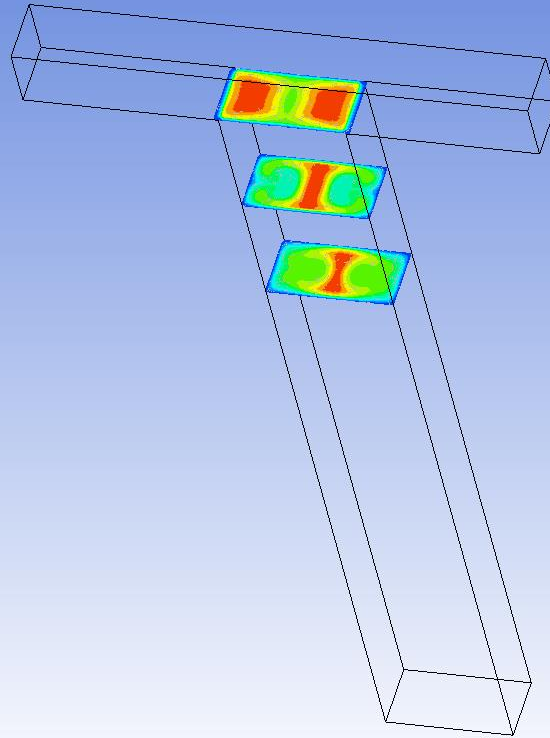
Velocity
Plane 5
4.459e+000
3.345e+000
2.230e+000
1.115e+000
0.000e+000
[m s⁻¹]

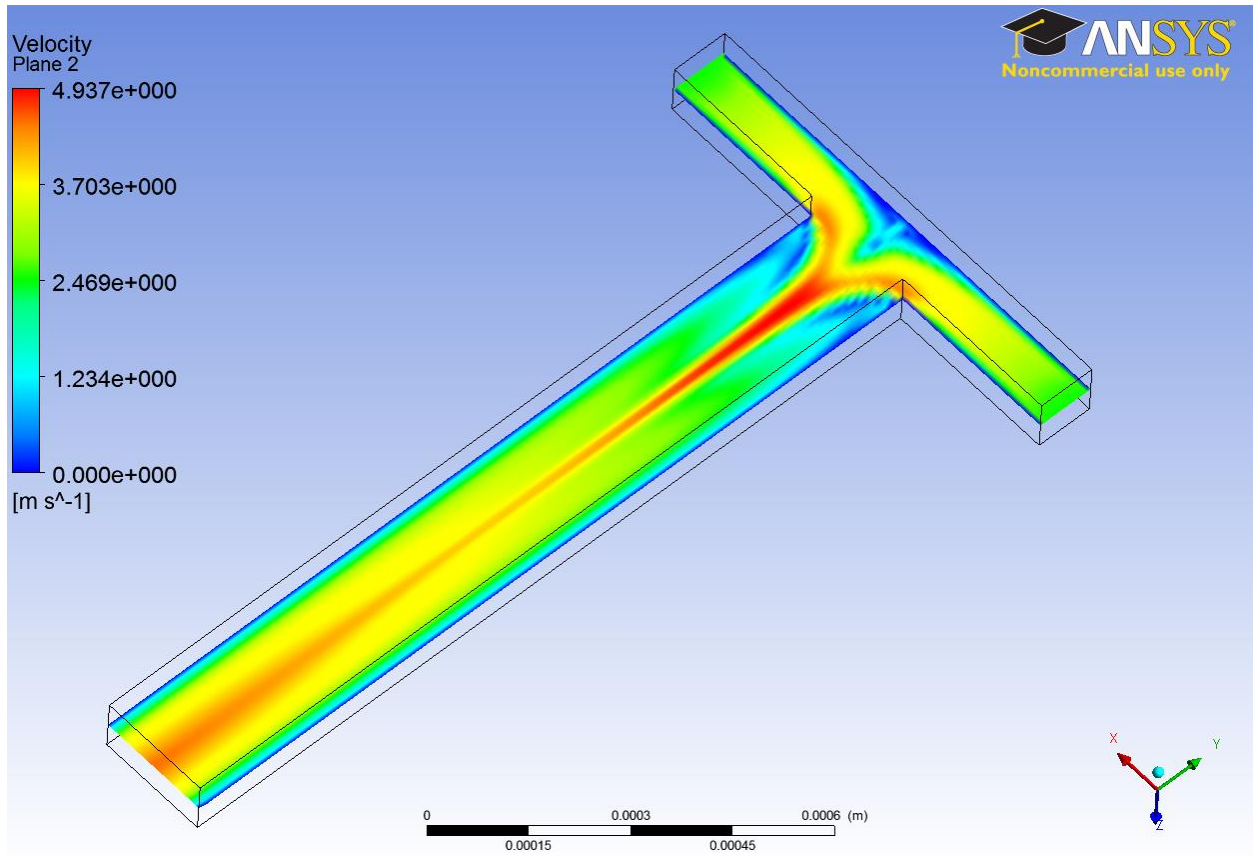


View 1 ▾

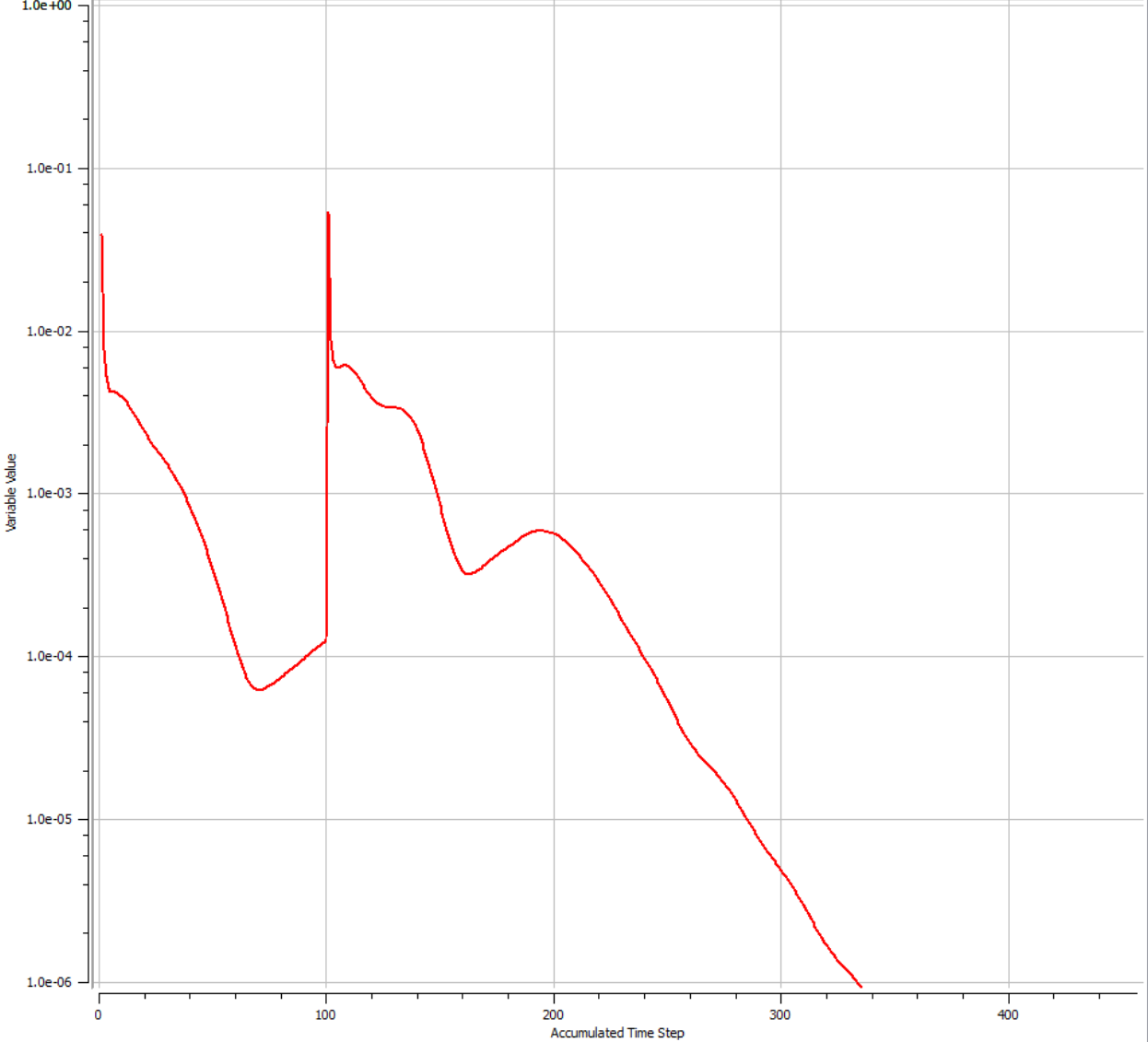


Velocity
Contour 3
4.798e+000
4.319e+000
3.839e+000
3.359e+000
2.879e+000
2.399e+000
1.919e+000
1.440e+000
9.597e-001
4.798e-001
0.000e+000
[m s⁻¹]

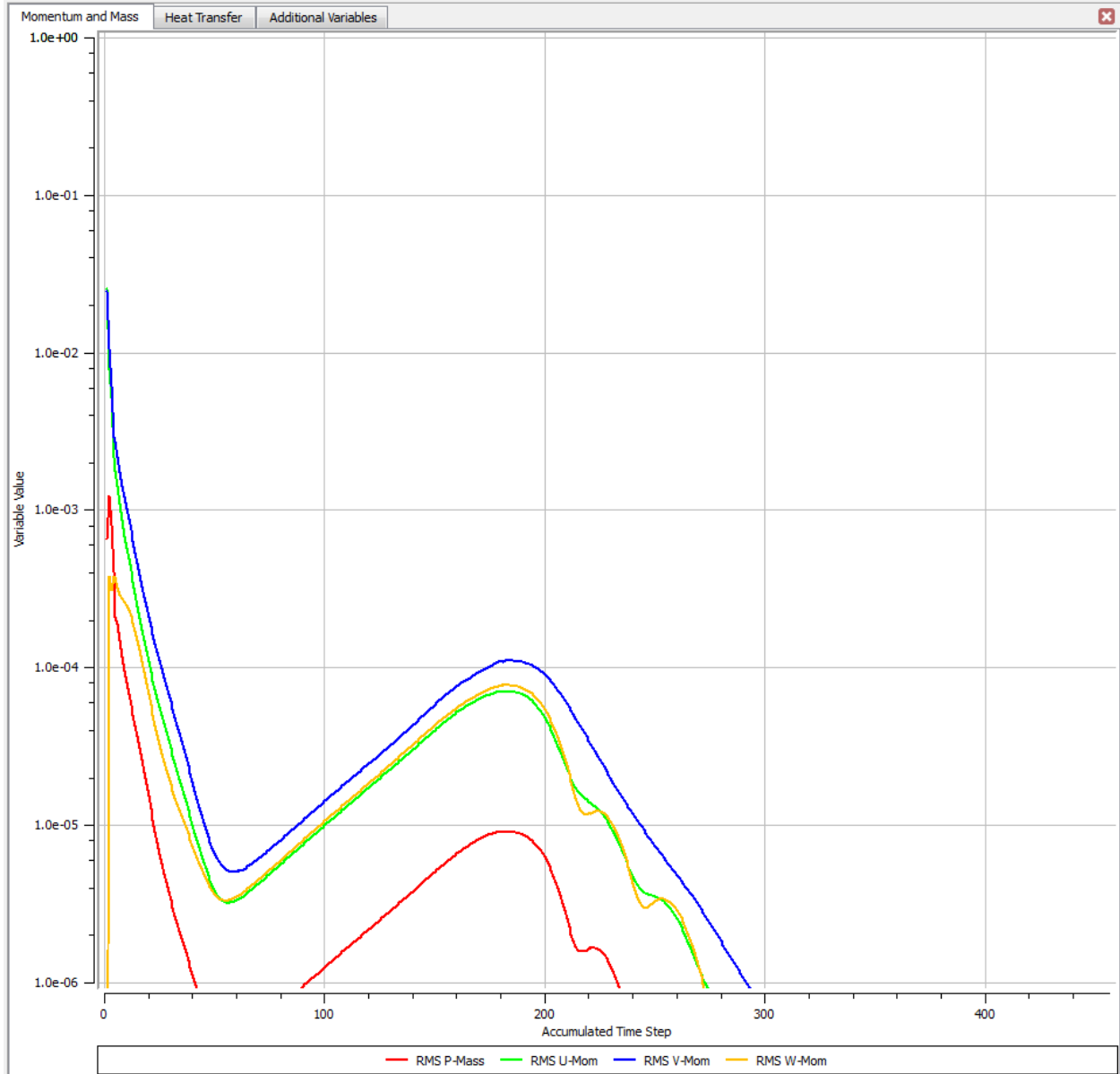




Task 3



Accumulated Time Step



```

+-----+
|                               Average Scale Information                               |
+-----+

```

Domain Name : Default Domain

```

Global Length           = 3.3011E-04
Minimum Extent          = 1.0000E-04
Maximum Extent          = 1.5000E-03
Density                 = 9.9700E+02
Dynamic Viscosity       = 8.8990E-04
Velocity                = 2.6244E+00
Advection Time          = 1.2579E-04
Reynolds Number         = 9.7059E+02
Thermal Conductivity    = 6.0690E-01
Specific Heat Capacity at Constant Pressure = 4.1817E+03
Prandtl Number          = 6.1316E+00
Temperature Range       = 1.0046E+02

```

```

+-----+
|                               Variable Range Information                               |
+-----+

```

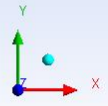
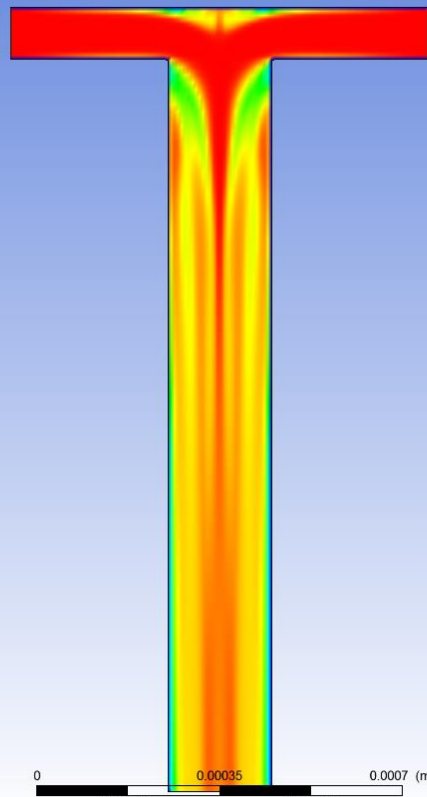
Domain Name : Default Domain

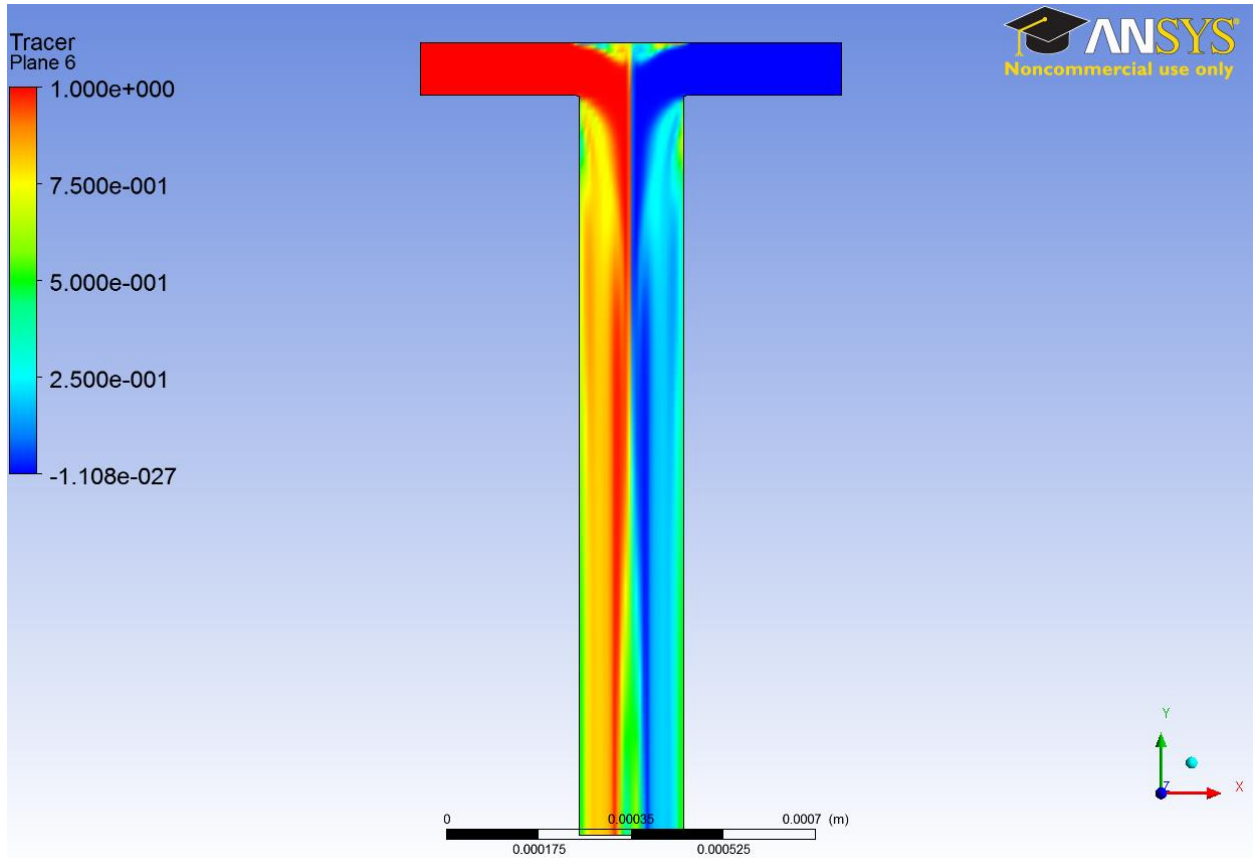
```

+-----+
| Variable Name | min | max |
+-----+
| Tracer        | -1.01E-22 | 1.00E+00 |
| Density       | 9.97E+02 | 9.97E+02 |
| Specific Heat Capacity at Constant Pressure | 4.18E+03 | 4.18E+03 |
| Dynamic Viscosity | 8.90E-04 | 8.90E-04 |
| Thermal Conductivity | 6.07E-01 | 6.07E-01 |
| Static Entropy | 4.60E+02 | 1.56E+03 |
| Velocity u    | -4.25E+00 | 4.25E+00 |
| Velocity v    | -4.91E+00 | 1.47E+00 |
| Velocity w    | -1.99E+00 | 1.98E+00 |
| Pressure      | -6.69E+01 | 1.74E+04 |
| Temperature   | 3.33E+02 | 4.33E+02 |
| Static Enthalpy | 1.45E+05 | 5.65E+05 |
+-----+

```

Temperature
Plane 6
4.333e+002
4.082e+002
3.832e+002
3.582e+002
3.331e+002
[K]





Area Average of Temperature on OUTLET

392.195 [K]

Area Integral of Heat Flux on Default Domain Default

-1.84134 [W]

Area Integral of Heat Flux on SYM1

-1.84424 [W]

Area Integral of Heat Flux on SYM2

-1.84232 [W]

Area Average of Temperature on SYM2

365.215 [K]

Area Average of Temperature on Default Domain Default

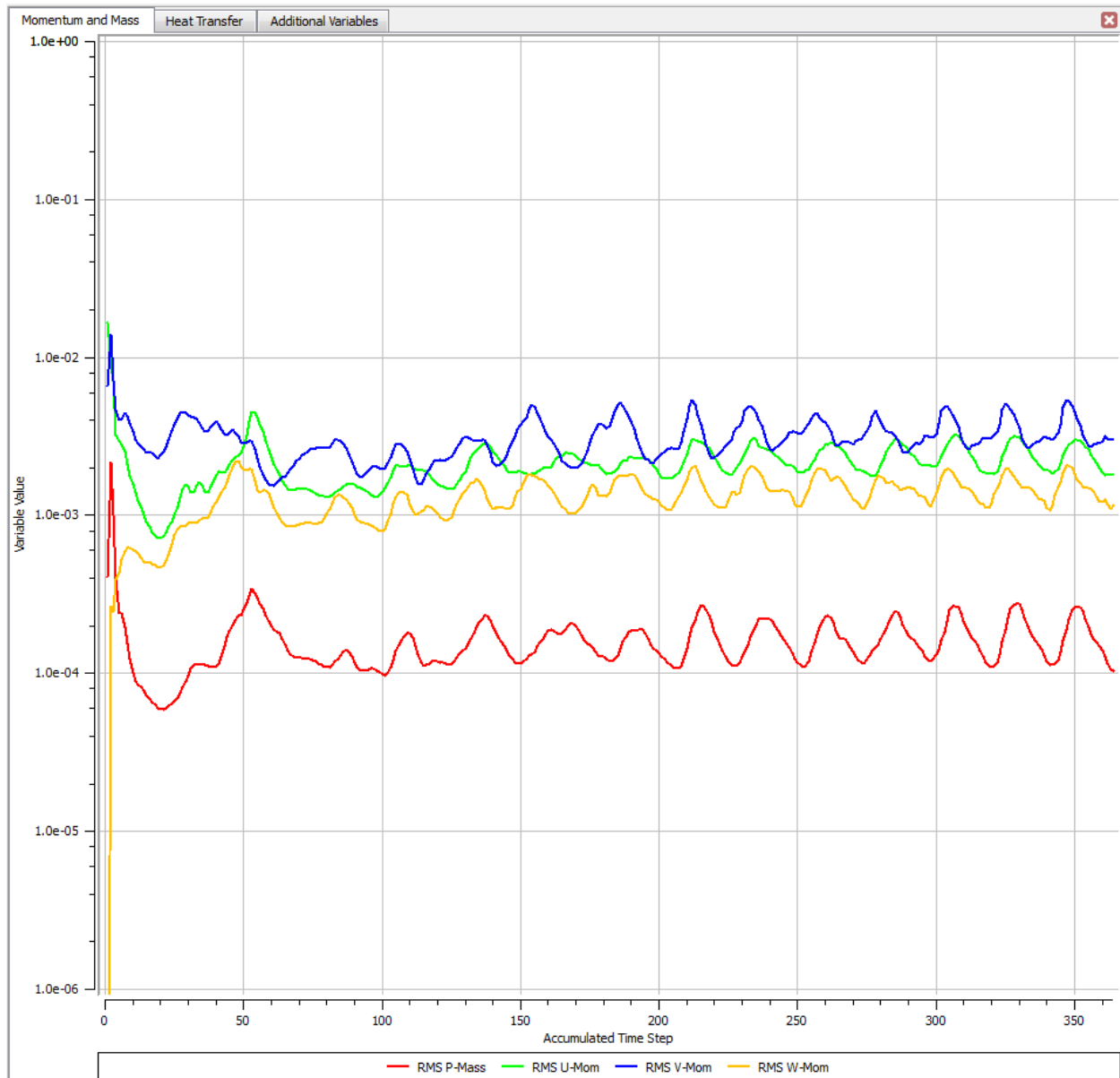
358.997 [K]

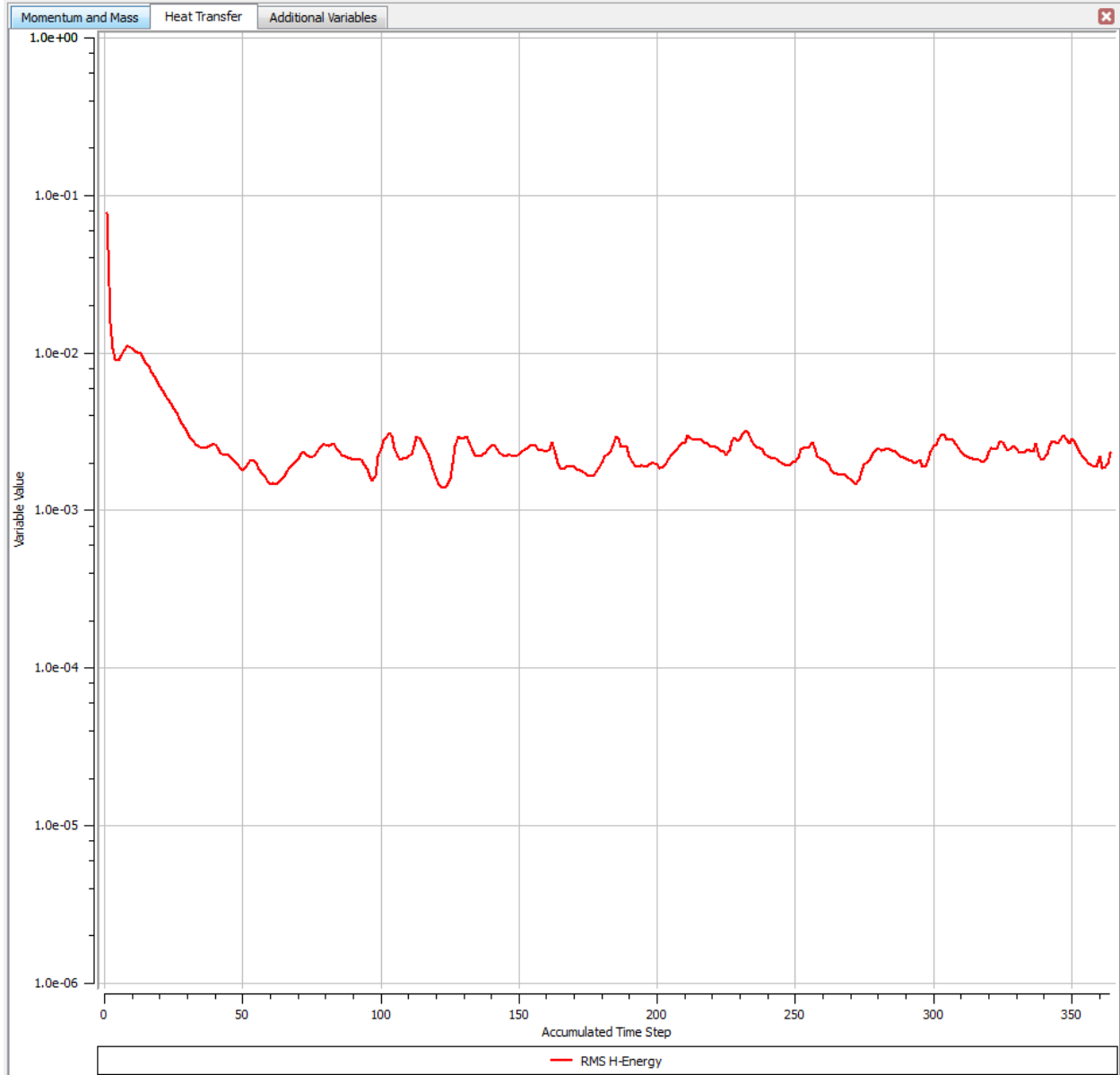
Calculate :

Volume on Default Domain

3.59727e-011 [m³]

Task 4





```

+-----+
|                               |
|                               |
+-----+

```

Average Scale Information

Domain Name : Default Domain

```

Global Length           = 3.3011E-03
Minimum Extent          = 1.0000E-03
Maximum Extent          = 1.5000E-02
Density                 = 9.9700E+02
Dynamic Viscosity       = 8.8990E-04
Velocity                = 2.6177E+00
Advection Time          = 1.2611E-03
Reynolds Number         = 9.6813E+03
Thermal Conductivity    = 6.0690E-01
Specific Heat Capacity at Constant Pressure = 4.1817E+03
Prandtl Number          = 6.1316E+00
Temperature Range       = 4.9902E+01

```

```

+-----+
|                               |
|                               |
+-----+

```

Variable Range Information

Domain Name : Default Domain

```

+-----+
|                               |
|                               |
+-----+

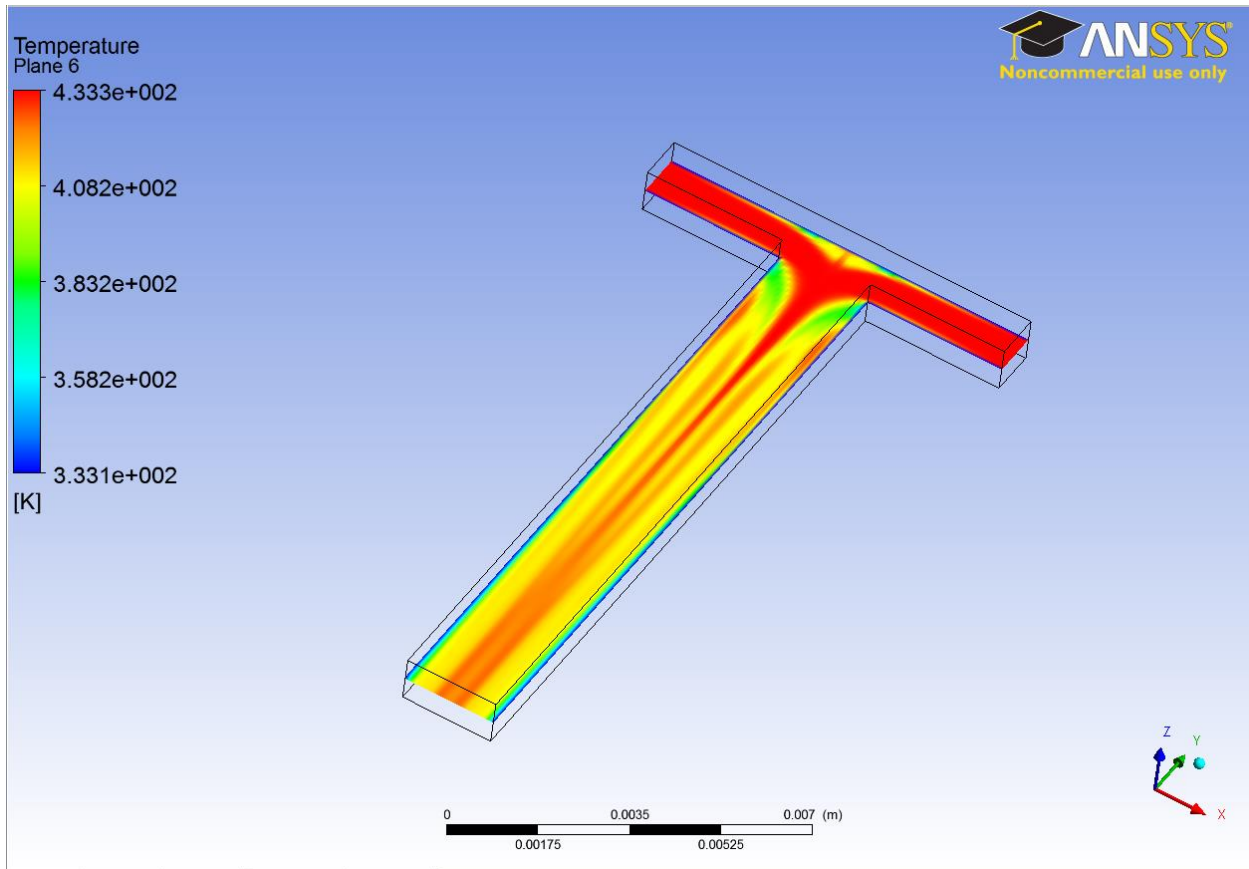
```

Variable Name	min	max
Tracer	-3.52E-02	1.07E+00
Density	9.97E+02	9.97E+02
Specific Heat Capacity at Constant Pressure	4.18E+03	4.18E+03
Dynamic Viscosity	8.90E-04	8.90E-04
Thermal Conductivity	6.07E-01	6.07E-01
Static Entropy	1.05E+03	1.56E+03
Velocity u	-4.28E+00	4.13E+00
Velocity v	-4.59E+00	3.09E+00
Velocity w	-2.35E+00	2.04E+00
Pressure	-8.10E+03	7.01E+03
Temperature	3.83E+02	4.33E+02
Static Enthalpy	3.56E+05	5.65E+05

```

+-----+

```



Area Integral of Heat Flux on Default Domain Default

-18.4127 [W]

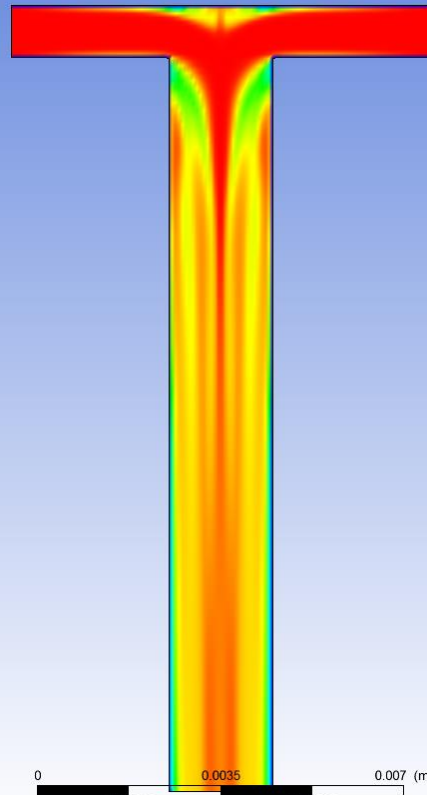
Area Integral of Heat Flux on SYM1

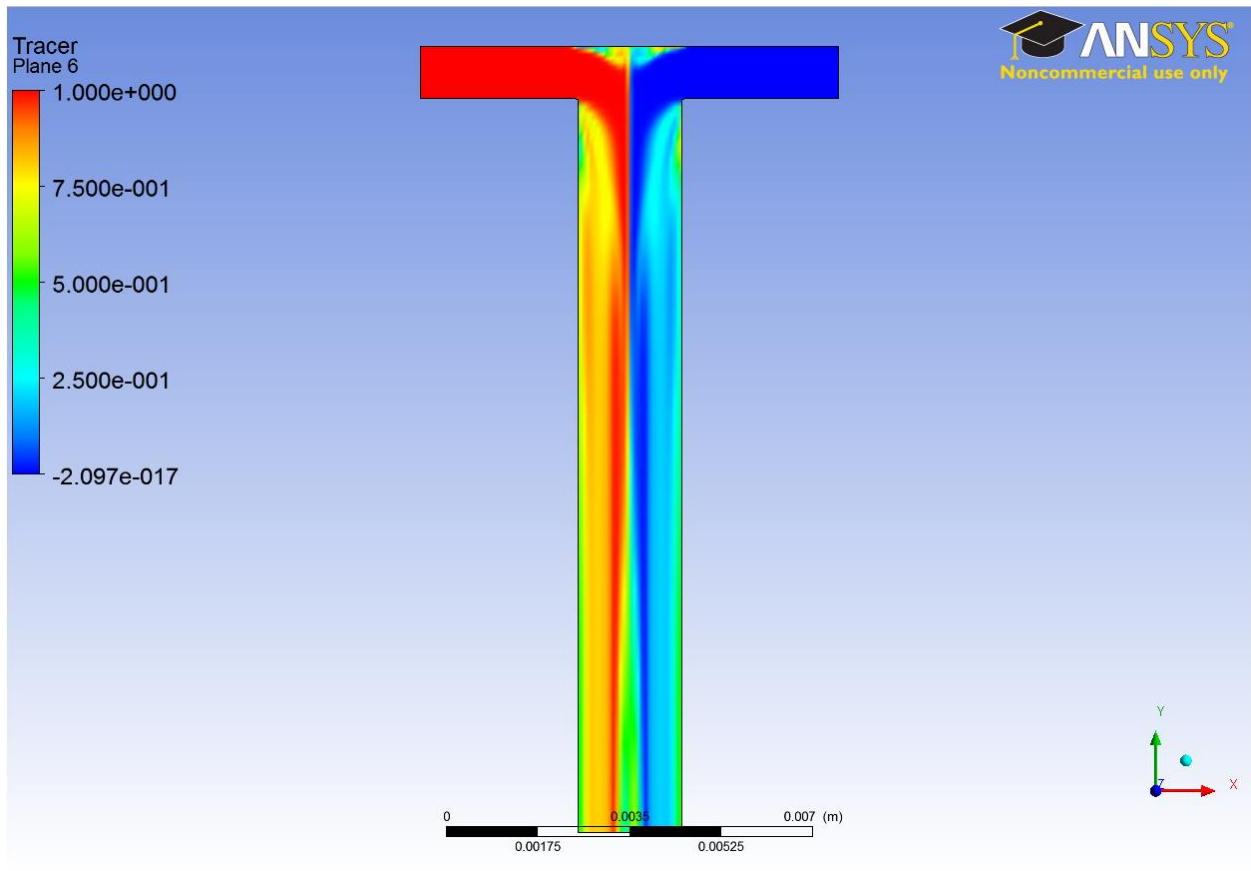
-18.4174 [W]

Area Integral of Heat Flux on SYM2

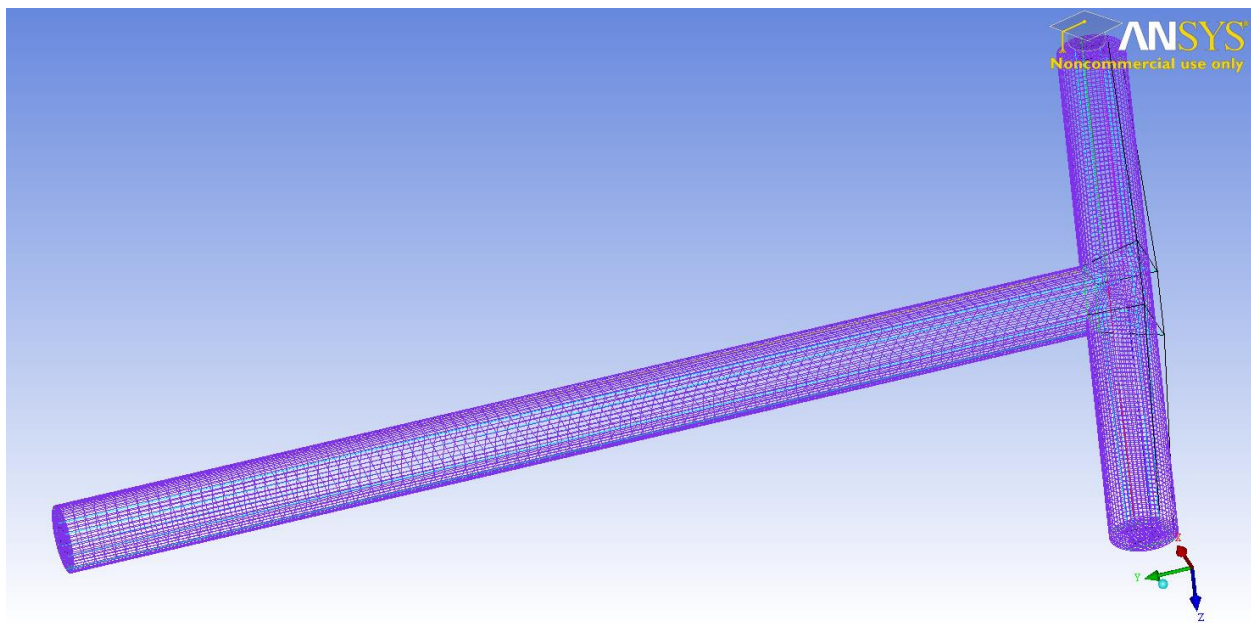
-18.452 [W]

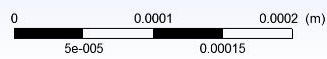
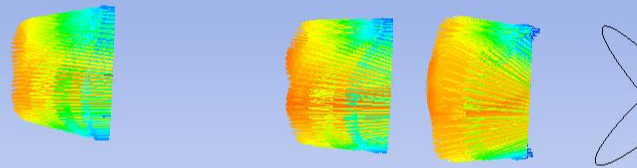
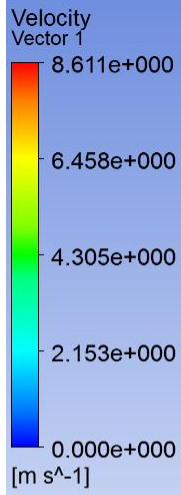
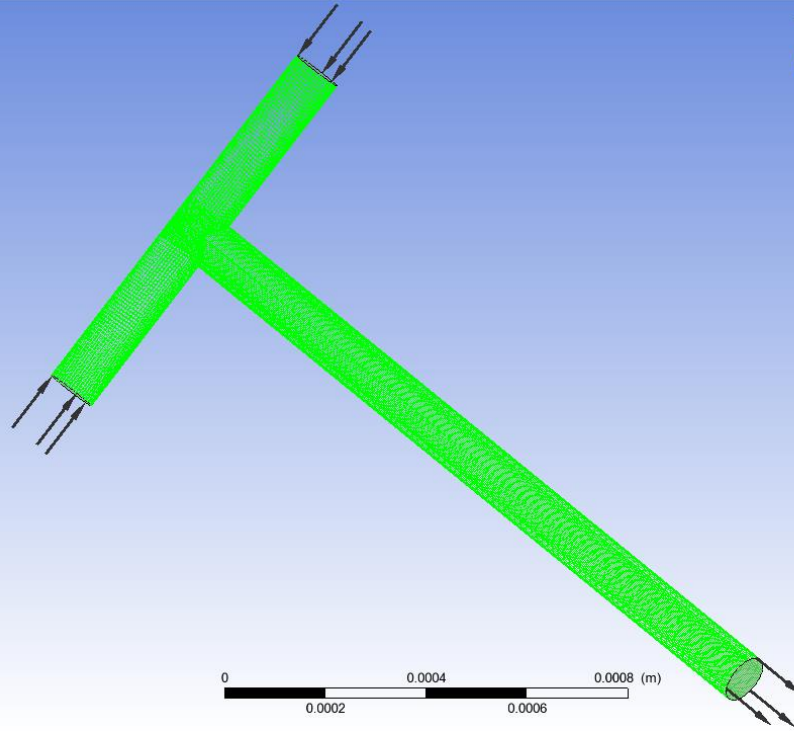
Temperature
Plane 6
4.333e+002
4.082e+002
3.832e+002
3.582e+002
3.331e+002
[K]



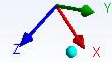
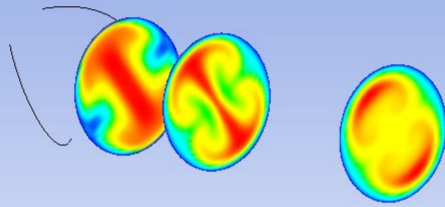


Task 5

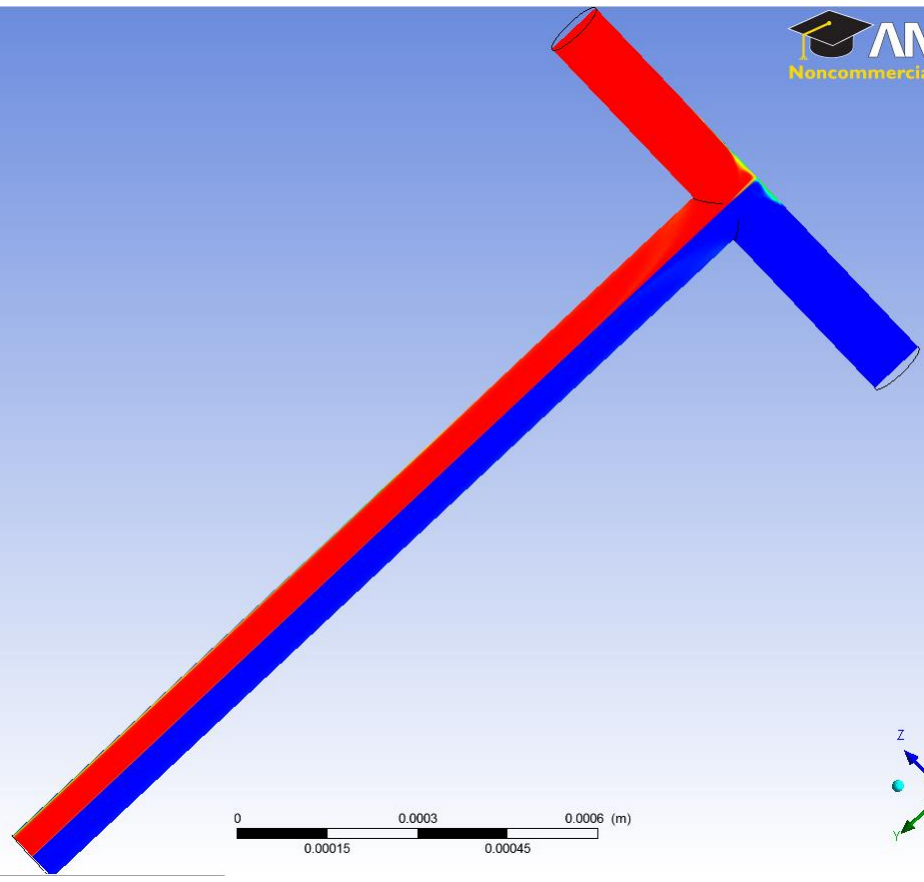
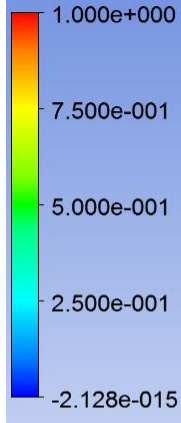




Velocity
Plane 3
7.791e+000
5.844e+000
3.896e+000
1.948e+000
0.000e+000
[m s⁻¹]



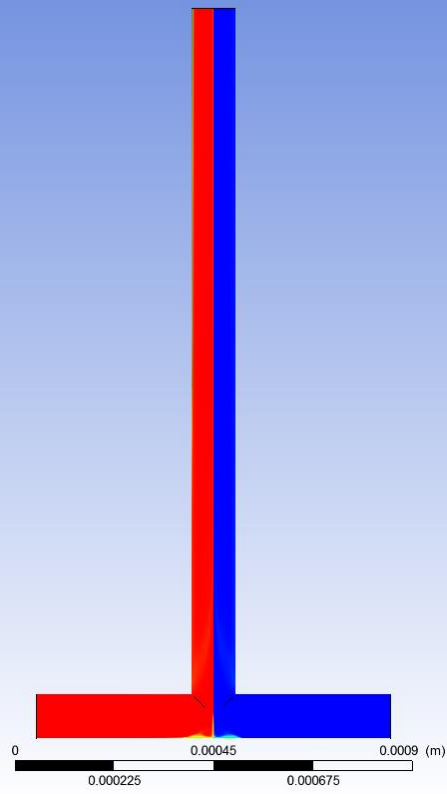
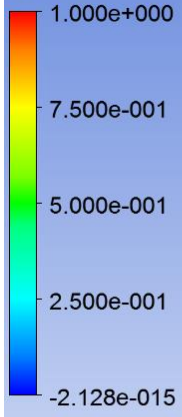
Tracer
Plane 6

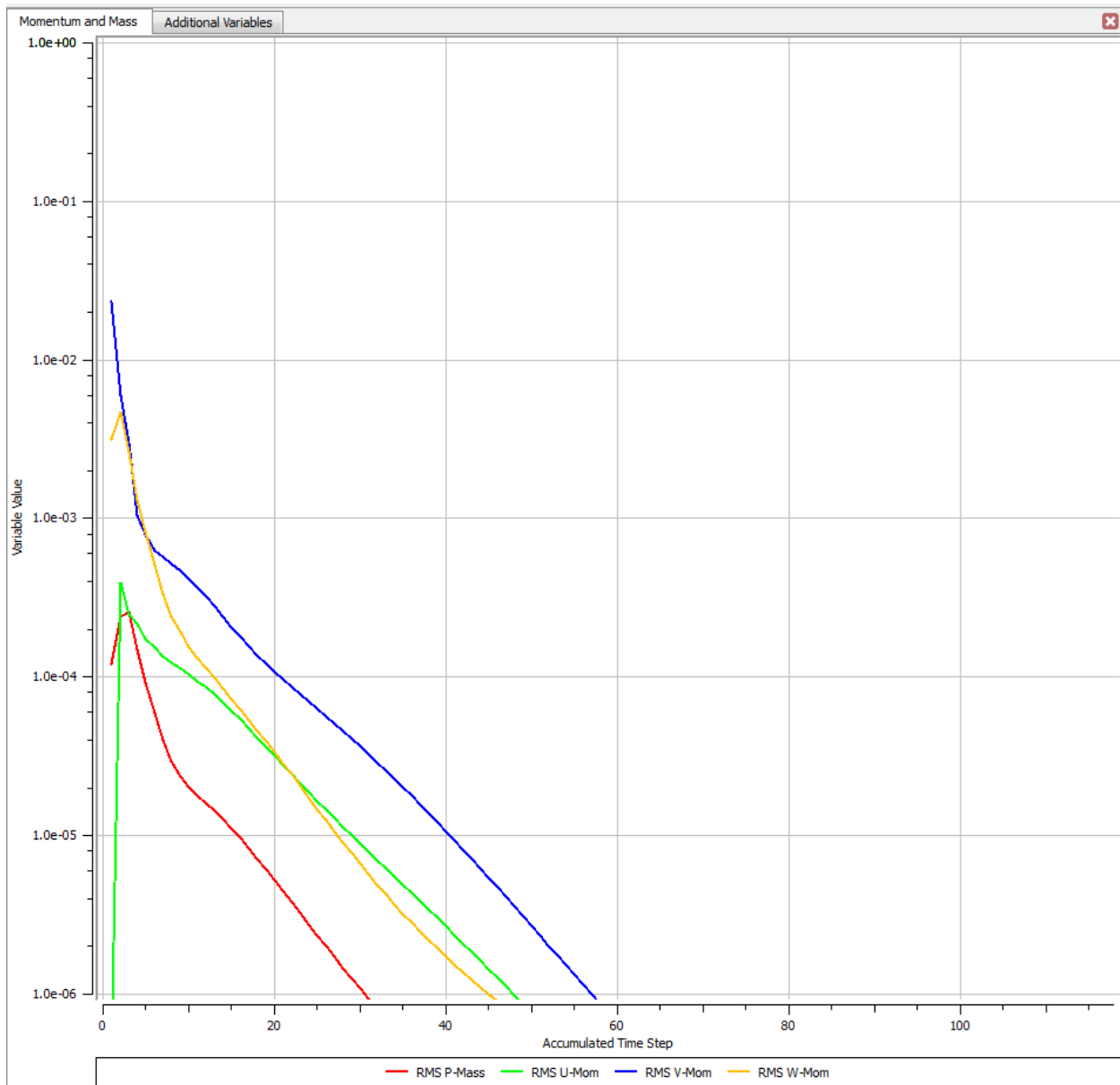


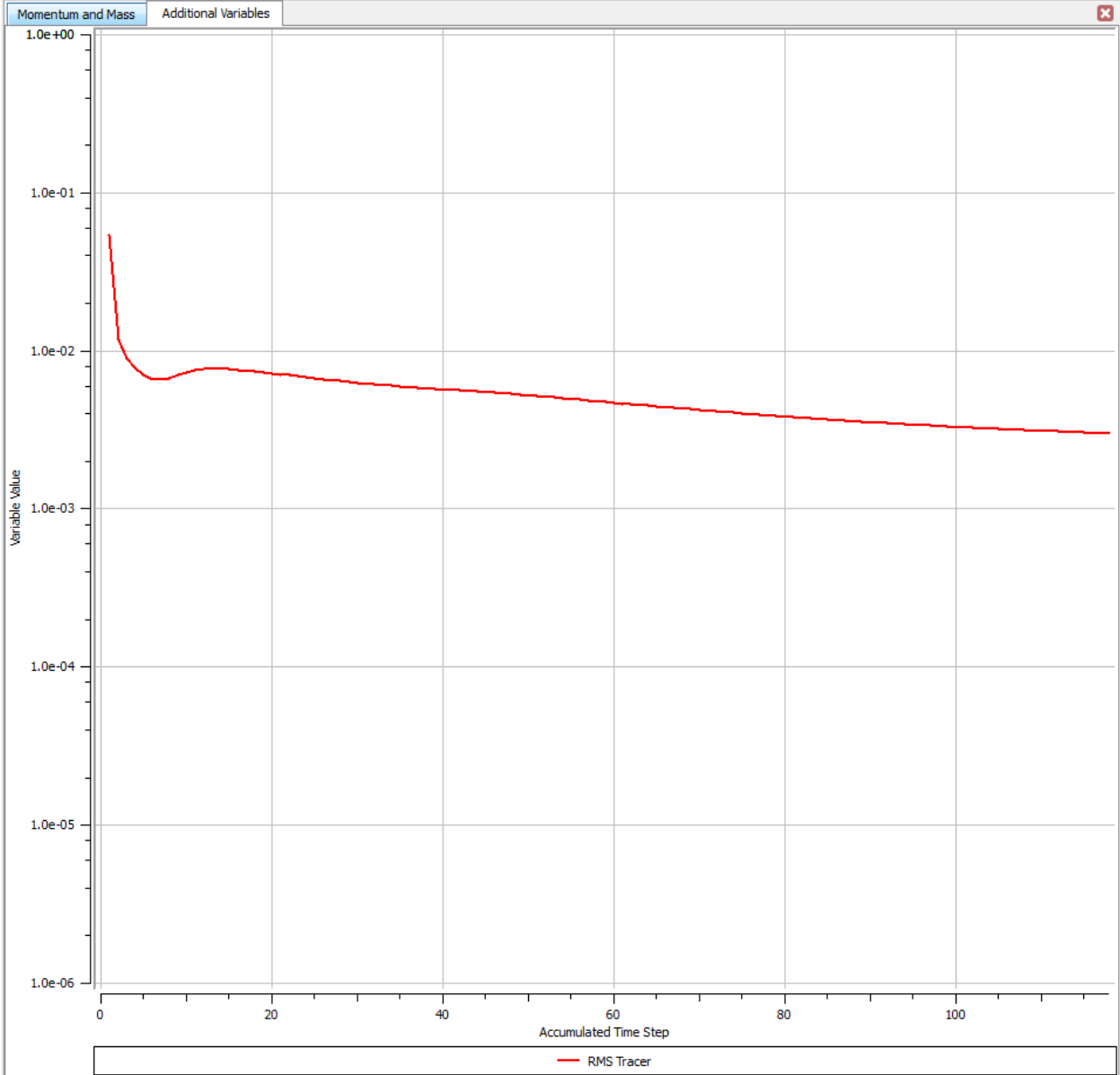
View 1



Tracer
Plane 6







```

+-----+
|                               |
|                               |
+-----+

```

Domain Name : Default Domain

```

Global Length           = 2.6437E-04
Minimum Extent         = 9.9997E-05
Maximum Extent         = 1.6500E-03
Density                = 9.9700E+02
Dynamic Viscosity      = 8.8990E-04
Velocity               = 4.8510E+00
Advection Time         = 5.4498E-05
Reynolds Number        = 1.4368E+03

```

```

+-----+
|                               |
|                               |
+-----+

```

Domain Name : Default Domain

```

+-----+
| Variable Name           | min | max |
+-----+
| Tracer                  | -2.29E-15 | 1.00E+00 |
| Density                 | 9.97E+02 | 9.97E+02 |
| Specific Heat Capacity at Constant Pressure | 4.18E+03 | 4.18E+03 |
| Dynamic Viscosity       | 8.90E-04 | 8.90E-04 |
| Thermal Conductivity    | 6.07E-01 | 6.07E-01 |
| Static Entropy          | 0.00E+00 | 0.00E+00 |
| Velocity u              | -3.14E+00 | 3.14E+00 |
| Velocity v              | -1.82E+00 | 8.61E+00 |
| Velocity w              | -5.62E+00 | 5.62E+00 |
| Pressure                | -3.78E+00 | 6.36E+04 |
| Temperature             | 2.98E+02 | 2.98E+02 |
+-----+

```

