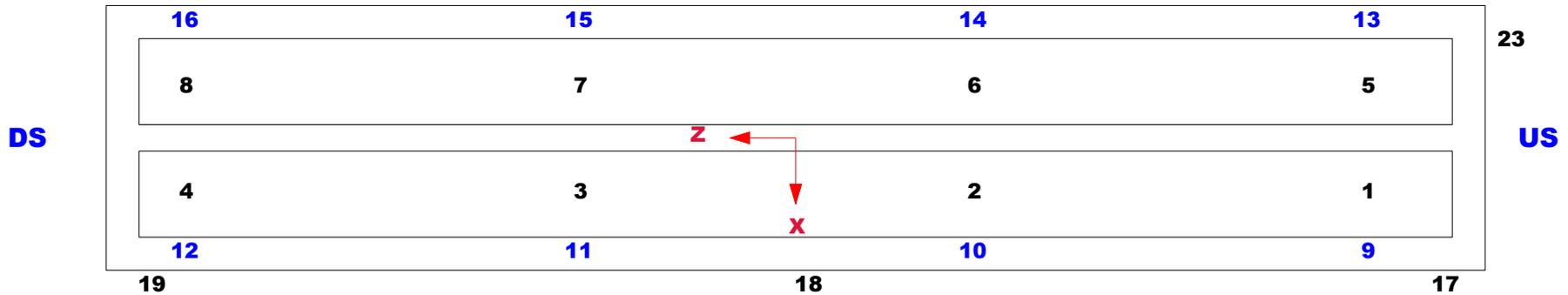


**.5in Tooling Ball Center Coordinates**

| Name  | X Corr.  | Y Corr. | Z Corr.   |
|-------|----------|---------|-----------|
| TB 9  | 430.188  | -0.540  | -1489.284 |
| TB 10 | 430.262  | -0.249  | -523.873  |
| TB 11 | 430.235  | -0.279  | 524.295   |
| TB 12 | 430.301  | -0.532  | 1489.595  |
| TB 13 | -430.188 | -0.324  | -1489.381 |
| TB 14 | -430.196 | -0.275  | -524.328  |
| TB 15 | -430.175 | 0.135   | 523.705   |
| TB 16 | -430.122 | -0.577  | 1489.104  |

**1.5in Tooling Ball Center Coordinates**

| Name  | X Corr.  | Y Corr.  | Z Corr.   |
|-------|----------|----------|-----------|
| TB 1  | 98.784   | 135.762  | -1665.609 |
| TB 2  | 98.765   | 135.777  | -555.459  |
| TB 3  | 98.594   | 135.778  | 556.072   |
| TB 4  | 98.909   | 135.770  | 1666.432  |
| TB 5  | -98.550  | 135.714  | -1666.539 |
| TB 6  | -98.670  | 135.843  | -555.991  |
| TB 7  | -98.808  | 135.792  | 555.583   |
| TB 8  | -98.604  | 135.709  | 1665.979  |
| TB 17 | 472.668  | -231.308 | -1581.485 |
| TB 18 | 473.538  | -228.484 | 86.903    |
| TB 19 | 472.280  | -229.115 | 1579.084  |
| TB 23 | -404.469 | -229.960 | -1709.445 |



**Grider centerline in reference to Beam Pipe Locating Pins**

Dimensions in MM, Angles in Milliradians



**HGVPU - Pre-Tune Fiducials at 9mm Gap, Tooling Balls**

|                      |              |                        |               |                        |               |
|----------------------|--------------|------------------------|---------------|------------------------|---------------|
| <b>Nominal Gap :</b> | <b>9.000</b> | <b>US Full :</b>       | <b>8.983</b>  | <b>DS Full :</b>       | <b>8.9825</b> |
| <b>Nom. Taper :</b>  | <b>0.000</b> | <b>US Wall Half :</b>  | <b>4.5000</b> | <b>DS Wall Half :</b>  | <b>4.4999</b> |
|                      |              | <b>US Aisle Half :</b> | <b>4.5000</b> | <b>DS Aisle Half :</b> | <b>4.4999</b> |

|                 |                      |
|-----------------|----------------------|
| <b>S/N</b>      | : <b>HXU_020</b>     |
| <b>Date</b>     | : <b>07-MAY-2019</b> |
| <b>Data Set</b> | : <b>0001</b>        |
| <b>Run</b>      | : <b>001</b>         |
| <b>Cam Pos.</b> | : <b>B</b>           |