

## How to define custom plate measurements for the U-2D Micro-Sample Management System in the Waters Acquity console software - How to

**It is always best to consult the user manual for any changes or options before making adjustments to you instruments.**

The Waters Acquity™ UHPLC chromatography software is programmable for X,Y,Z sampling. The pre-existing configurations are pre-programmed and stored for customers to get up and running fast. The system expects to hit resistance within some tolerance of the configured heights, or it will error. This is a 'fail-safe' to prevent damage to the autosampler if the user had the wrong configuration plate or vial loaded into the sample method.

If you want to set a custom plate, an example would be taking a 1ml ANSI plate that has a 7mm ID well, a 27mm depth, and a height of 31mm. If you bring up a plate, modify the dimensions and save it as another name, you should be all set. See below.

The U-2D™ plate is ANSI/SLAS (Society For Laboratory Automation and Screening) compliant and conforms to SBS standards and follows the ANSI/SLAS Microplate Standards and when the Rack and Base are mated is virtually indistinguishable from existing glass insert 96 Formatted well plates (and similar).

Number Of Vials: Rows 8, Columns 12

Vial Spacing: 1/10mm, 90

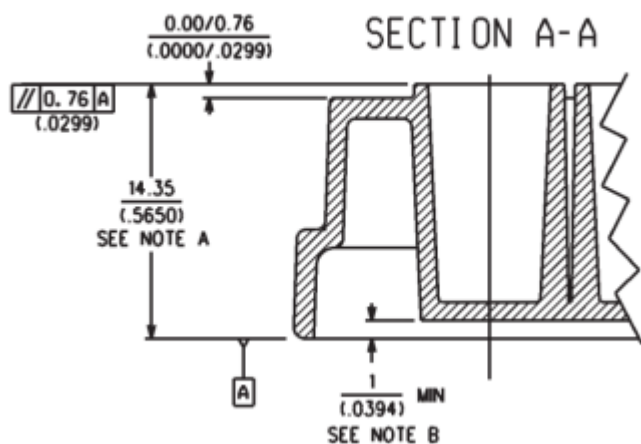
Vial 1/10mm: Diameter 70, Depth 270

Offsets: Column 0 1/10mm, Row 0 1/10mm

Plate Size: X 1280 1/10mm, Y 860 1/10mm, Z 310 10mm

Top Left Vial Offset: X 144 1/10mm, Y 112 1/10mm

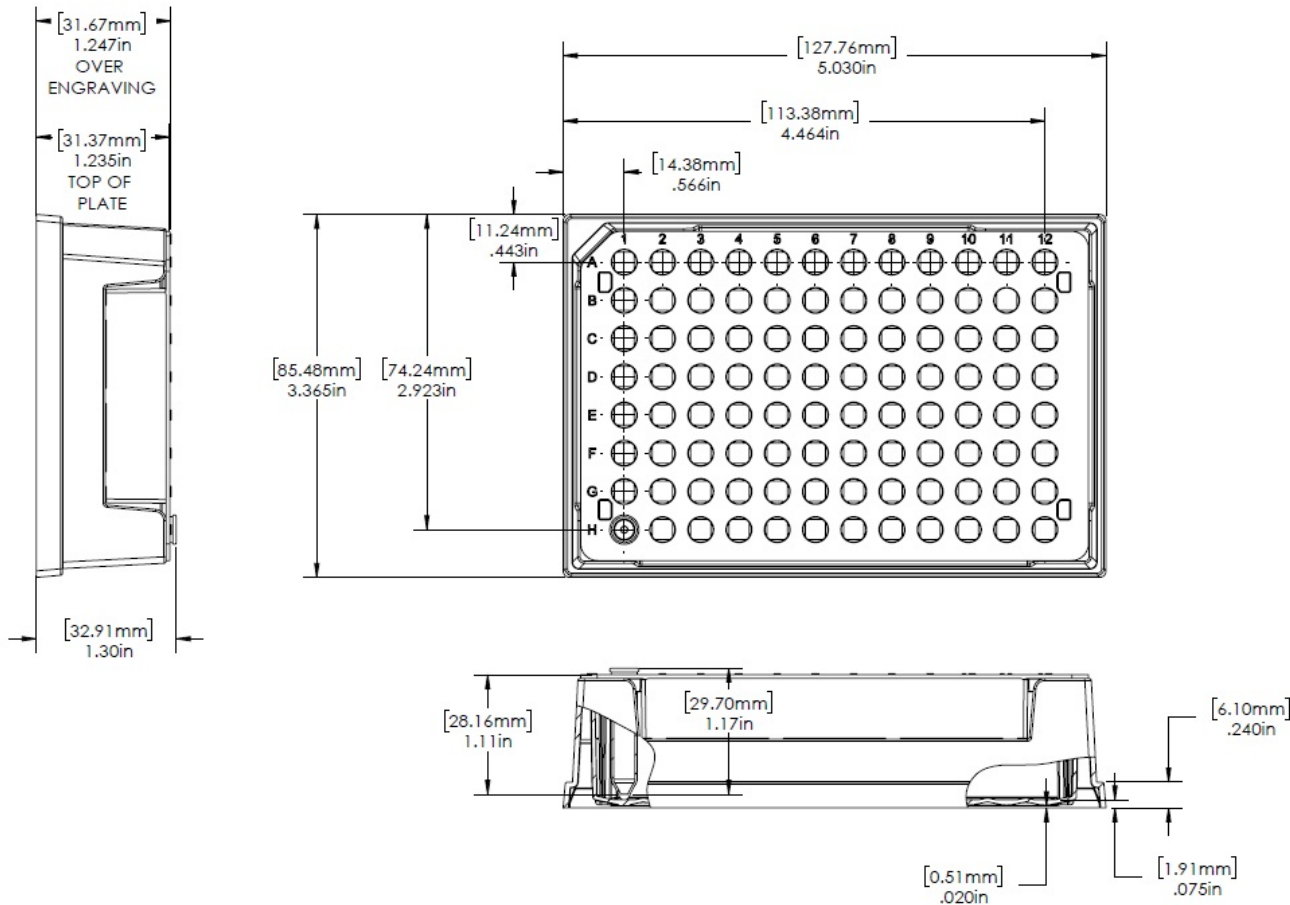
ANSI/SLAS Microplate Standards (ANSI/SLAS 1 to 4 - 2004)



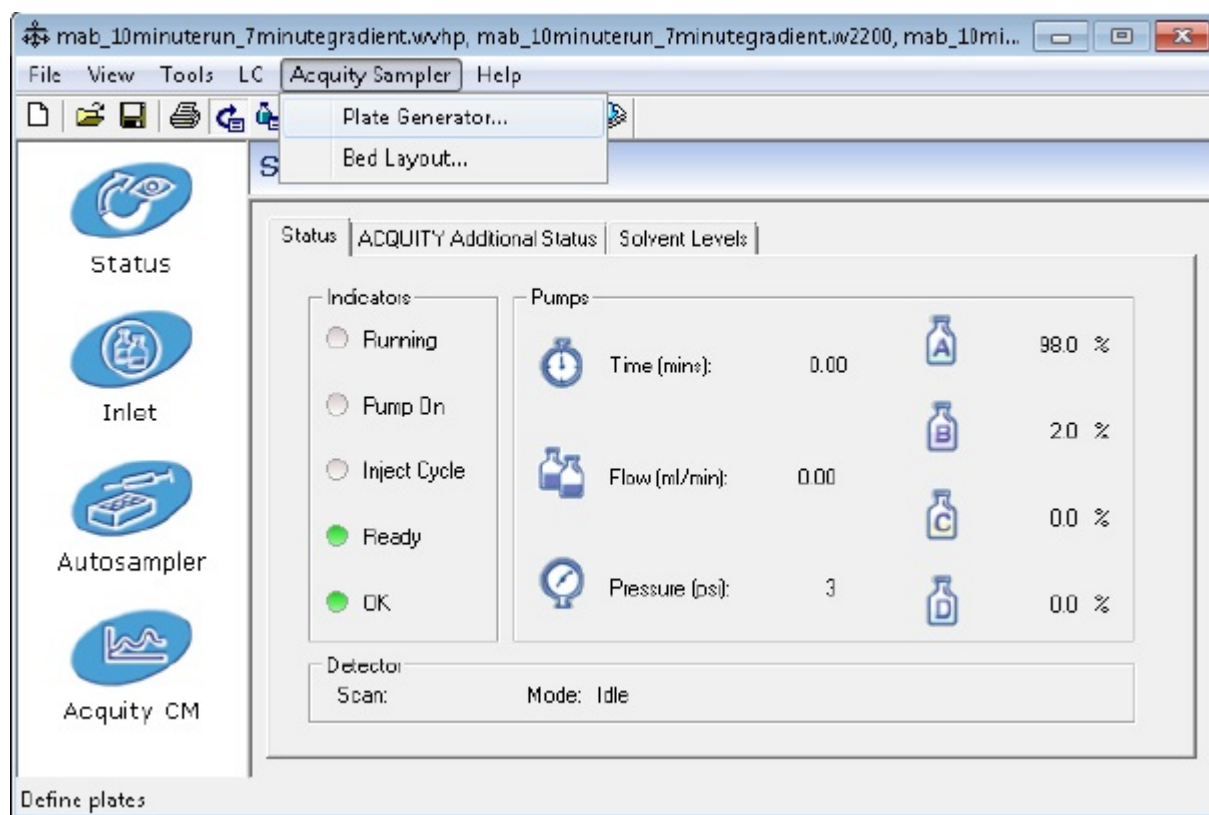
### Mechanical Drawings Defining Height Of A Typical Microplate

The Society For Laboratory Automation And Screening (SLAS) is not a standardizing organization; they are a society that provides a working group the ability and platform to standardize along with the American National Standards Institute (ANSI).

Dimensions of the U-2D plates:



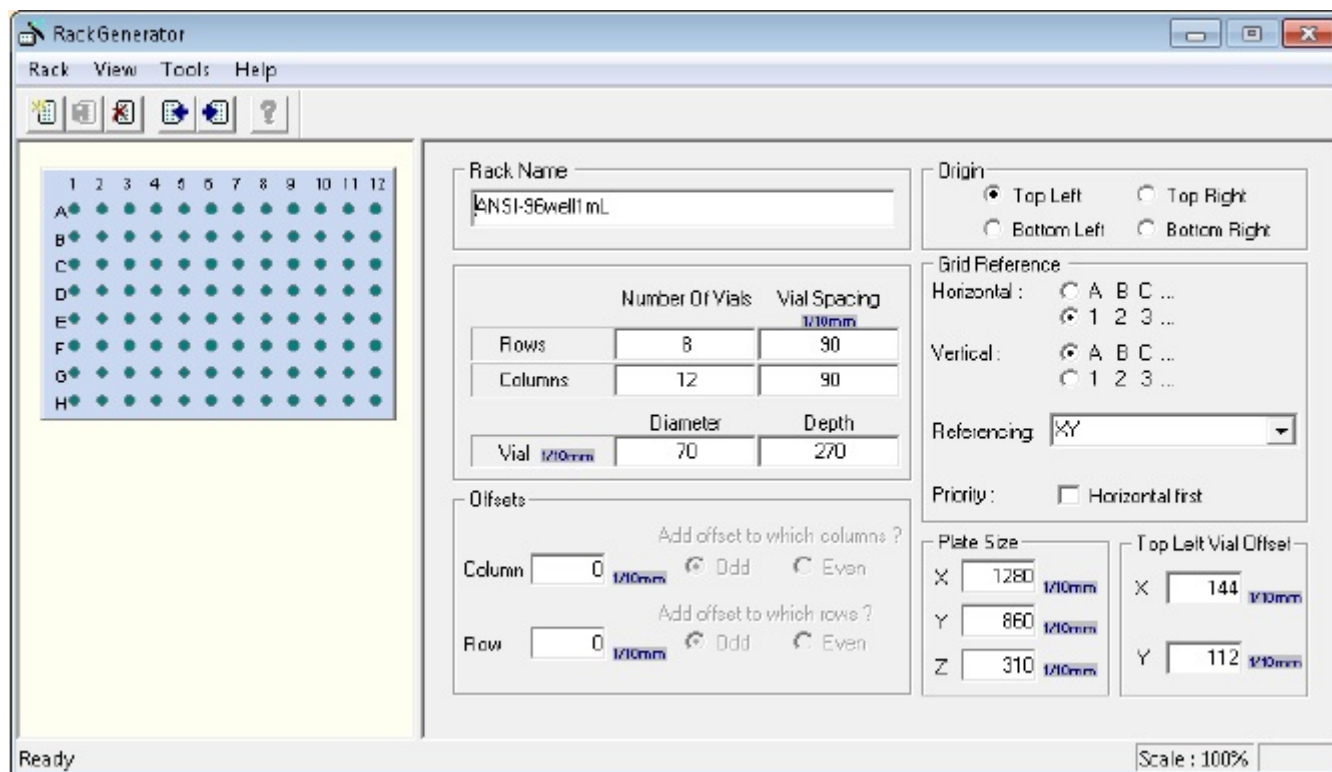
Open inlet method:



Modify X, Y, Z:



1. Using the blue arrows at the top, click through the different plates that are already programmed.
2. Click Rack > New Rack to save new plate types.
3. Modify any of the dimensions
4. Click Rack > Save Current Rack



Click here for more information about Microplate Footprint

Standards [https://www.slas.org/SLAS/assets/File/ANSI\\_SLAS\\_1-2004\\_FootprintDimensions.pdf](https://www.slas.org/SLAS/assets/File/ANSI_SLAS_1-2004_FootprintDimensions.pdf)

Click here for more information about Microplate Height Standards



[https://www.slas.org/SLAS/assets/File/ANSI\\_SLAS\\_2-2004\\_HeightDimensions.pdf](https://www.slas.org/SLAS/assets/File/ANSI_SLAS_2-2004_HeightDimensions.pdf)

Click here for more information about Microplate Bottom Outside Flange Standards

[https://www.slas.org/SLAS/assets/File/ANSI\\_SLAS\\_3-2004\\_BottomOutsideFlangeDimensions.pdf](https://www.slas.org/SLAS/assets/File/ANSI_SLAS_3-2004_BottomOutsideFlangeDimensions.pdf)

Click here for more information about Microplate Well Positions Standards

[https://www.slas.org/SLAS/assets/File/ANSI\\_SLAS\\_4-2004\\_WellPositions.pdf](https://www.slas.org/SLAS/assets/File/ANSI_SLAS_4-2004_WellPositions.pdf)

Click here for more information about Microplate Well Bottom Elevation Standards

[https://www.slas.org/SLAS/assets/File/Press%20Releases/ASNI\\_SLAS\\_6-WellBottomElevation%20NEW.pdf](https://www.slas.org/SLAS/assets/File/Press%20Releases/ASNI_SLAS_6-WellBottomElevation%20NEW.pdf)

## **Attachments**

**Drawing of specifications 350ul 96 well dimensions pdf** [Download File](#)