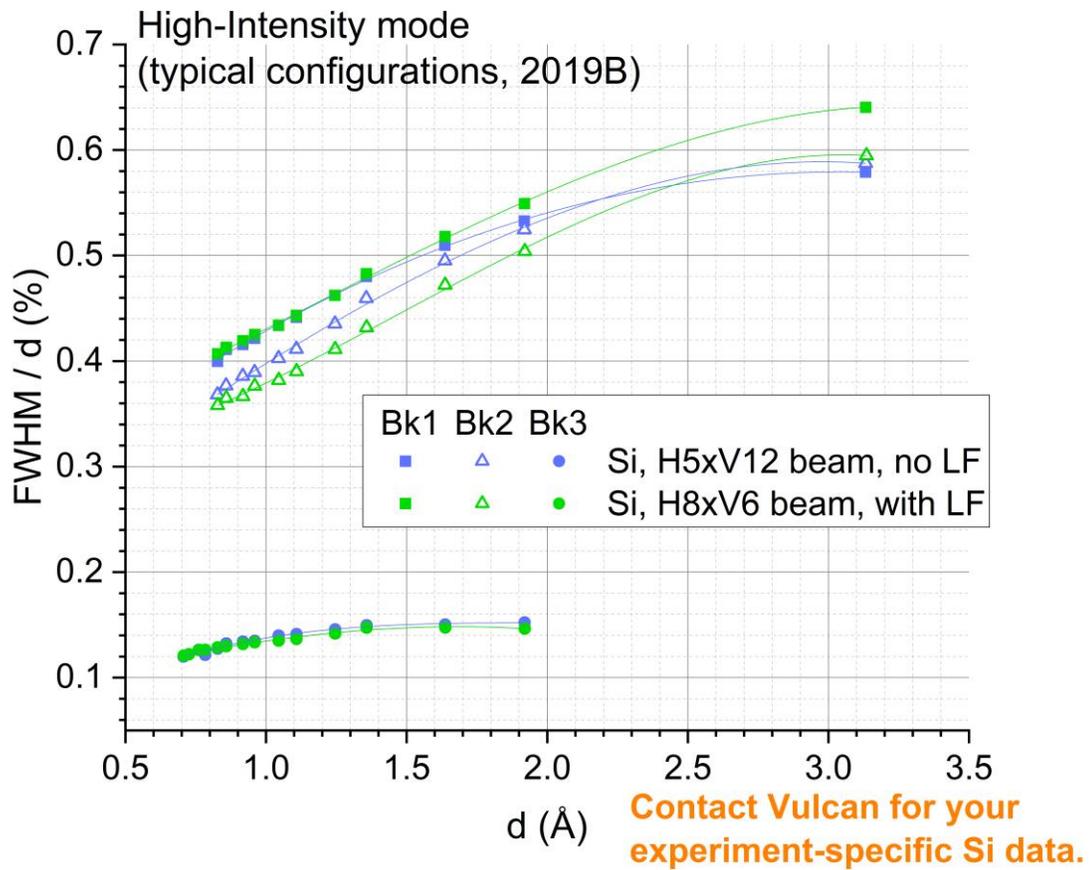


## Vulcan instrument broadenings at high-intensity mode



Note:

H: horizontal incident slit size (IHA), in mm; V: vertical incident slit size (IVA), in mm.

LF: load frame

Bk1: detector bank 1 (west bank), typically measuring loading direction

Bk2: detector bank 2 (east bank), typically measuring transverse direction

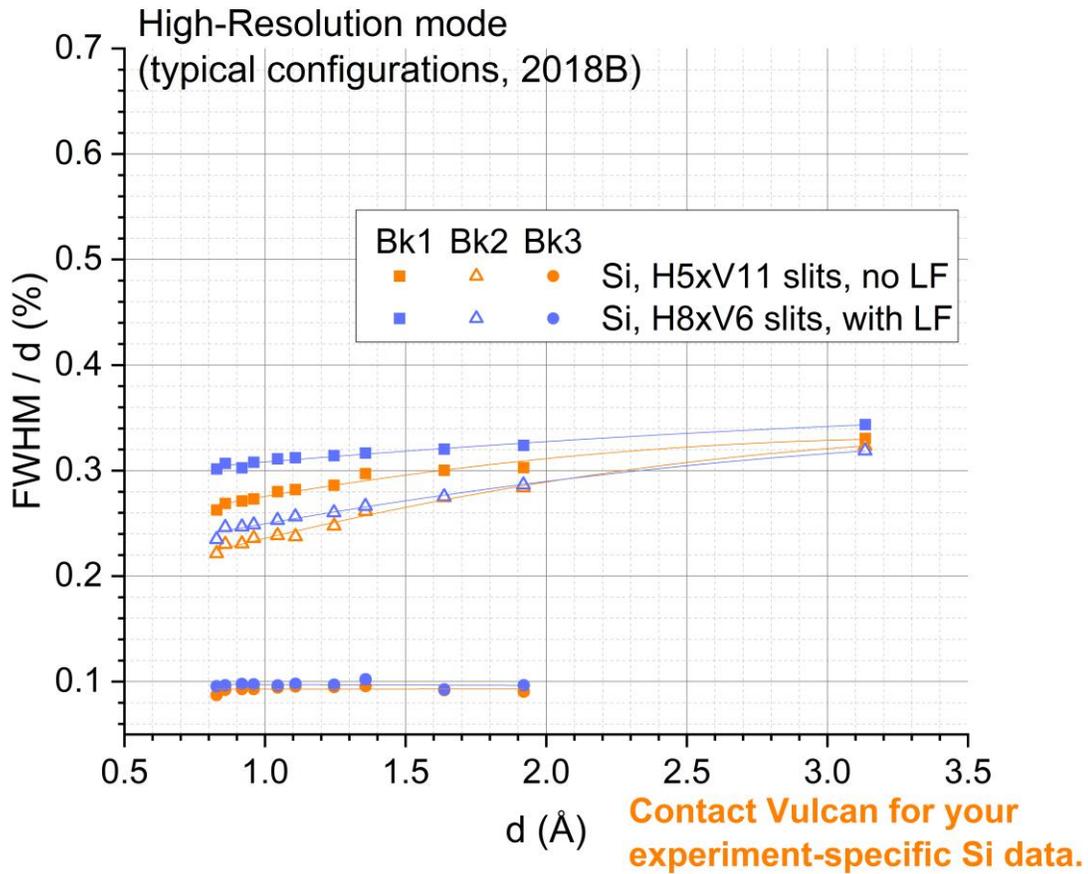
Bk3: detector bank 3 (LPSD), high angle bank, measuring a direction 30° off the normal direction.

The 5mm collimators at Bk1 and Bk2 were used in the measurement.

The lines are the fitting data using a cubic function.

Measured at 2019B cycle. Contact instrument scientist if the experiment-specific standard Si powder measurement is required.

## Vulcan instrument broadenings at high-resolution mode



Note:

H: horizontal incident slit size (IHA), in mm; V: vertical incident slit size (IVA), in mm.

LF: load frame

Bk1: detector bank 1 (west bank), typically measuring loading direction

Bk2: detector bank 2 (east bank), typically measuring transverse direction

Bk3: detector bank 3 (LPSD), high angle bank, measuring a direction 30° off the normal direction.

The 5mm collimators at Bk1 and Bk2 were used in the measurement.

The lines of Bk1 and Bk2 are the fitting data using a quadratic function, and Bk3 using a linear function.

Measured at 2018B-2019A cycle. Contact instrument scientist if the experiment-specific standard Si powder measurement is required.