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| autoPROC | 1.3.0 (20200318) |
| XDS | VERSION Jan 31, 2020 BUILT=20200131 |
| AIMLESS | Version 0.7.4 |
| STARANISO | Version 2.3.33 (11-Apr-2020) |
| CCP4 | Version 7.0.078 |
| Host | server8 |
| User | vonrhein (group = users) |
| Date | Tue Apr 21 22:11:07 CEST 2020 |
| autoPROC | /home/software/xtal/GPhL/20200420 |
| 2a | m1a2peg-2 #####.cbf (300 images, 150°) |
| 3a | m1a2peg-3 #####.cbf (350 images, 175°) |

Isotropic data analysis:

| Spacegroup | P1 |
|------------------------------|---|
| Cell parameters | 30.1468 37.7807 64.8130 95.8014 97.9852 90.1138 0.97918 |
| Wavelength [Å] | |
| | Overall Inner Shell Outer Shell |
| Low resolution limit | 37.582 37.582 1.645 |
| High resolution limit | 1.617 4.386 1.617 |
| Rmerge (all I+ & I-) | 0.098 0.040 0.502 |
| Rmeas (all I+ & I-) | 0.125 0.053 0.710 |
| Rpim (all I+ & I-) | 0.075 0.034 0.502 |
| Total number of observations | 84195 3890 1703 |
| Total number unique | 31282 1648 1071 |
| Mean(I)/sd(I) | 18.2 39.5 5.3 |
| Completeness | 86.8 91.6 59.8 |
| Multiplicity | 2.7 2.4 1.6 |
| CC(1/2) | 0.990 0.992 0.481 |
| Anomalous completeness | 72.8 81.3 30.7 |
| Anomalous multiplicity | 1.5 1.2 1.0 |
| CC(ano) | -0.072 0.135 NA |
| DANO /sd(DANO) | 0.966 0.888 1.466 |

Final scaling/merging - isotropic data analysis

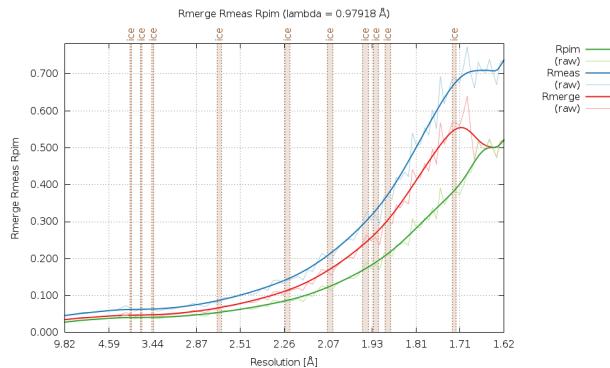


Fig.1 : R-values as a function of resolution

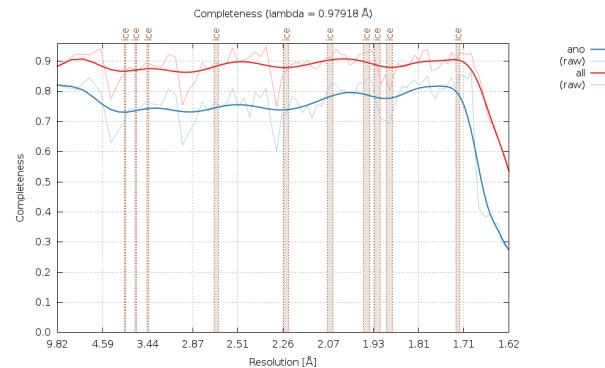


Fig.2 : Completeness as a function of resolution

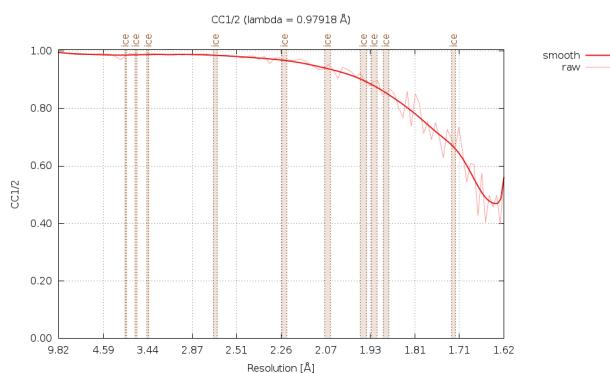


Fig.3 : CC1/2 as a function of resolution

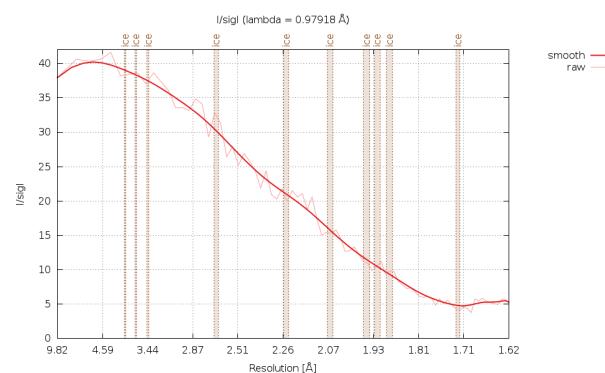


Fig.4 : I/sigI as a function of resolution

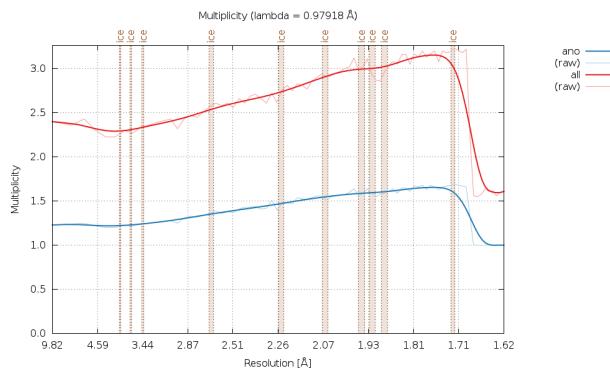


Fig.5 : Multiplicity as a function of resolution

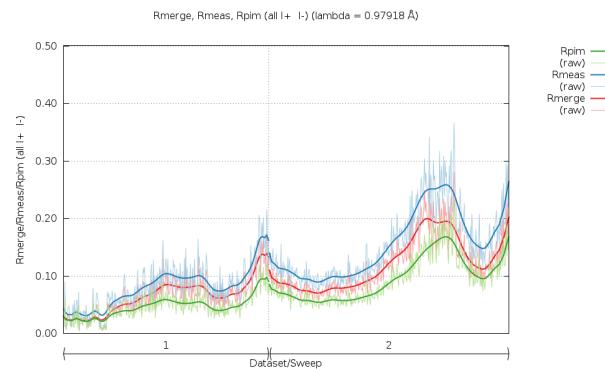


Fig.6 : R-values as a function of image number

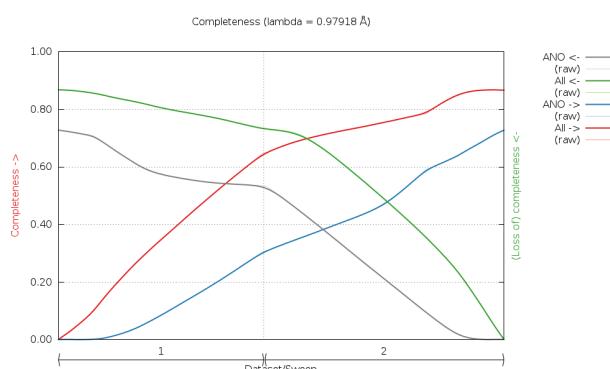


Fig.7 : Completeness as a function of image number

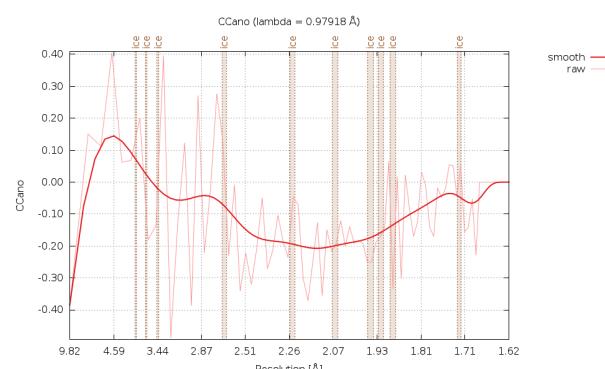


Fig.8 : CCano as a function of resolution

Final scaling/merging - isotropic data analysis

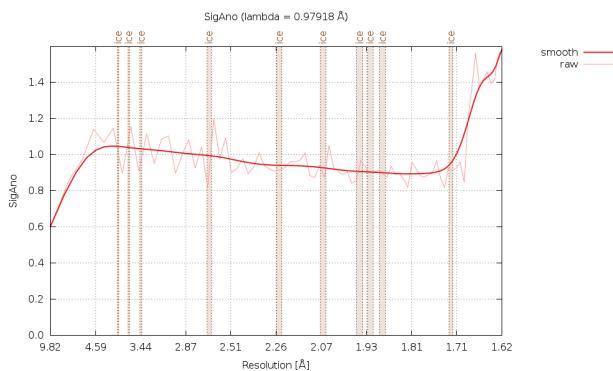


Fig.9 : SigAno as a function of resolution

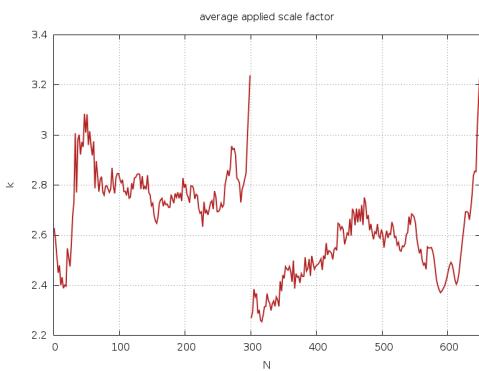


Fig.10 : Scale factor (AIMLESS scaling) as a function of image number

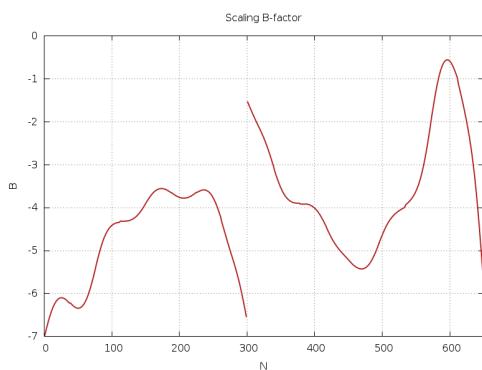


Fig.11 : Scaling B-factor (AIMLESS scaling) as a function of image number

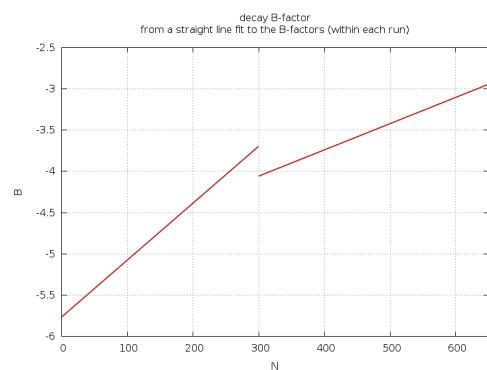


Fig.12 : Decay B-factor (AIMLESS scaling) as a function of image number

Data processing sweep 2a

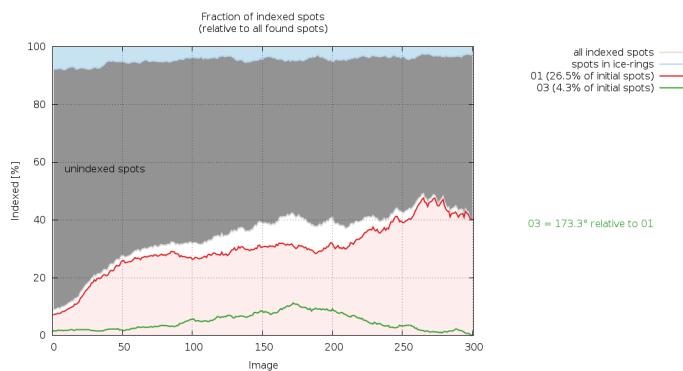


Fig.13 : (sweep 2a) number of spots for each indexing solution as a function of image number

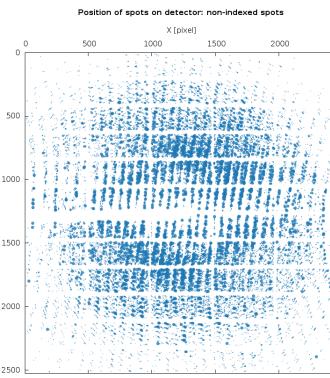


Fig.14 : (sweep 2a) unindexed spots as a function of detector position

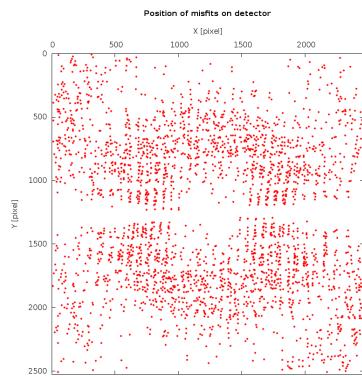


Fig.15 : (sweep 2a) reflections classified as misfits (as a function of detector position)

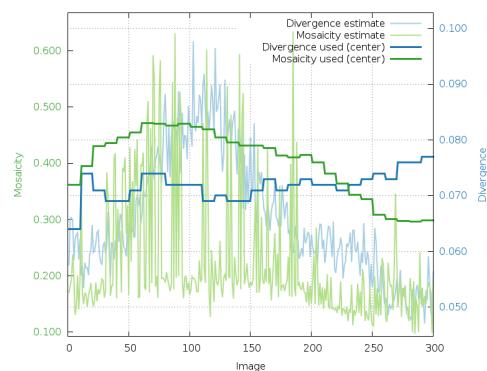


Fig.16 : (sweep 2a) divergence and mosaicity (estimated and used) as a function of image number

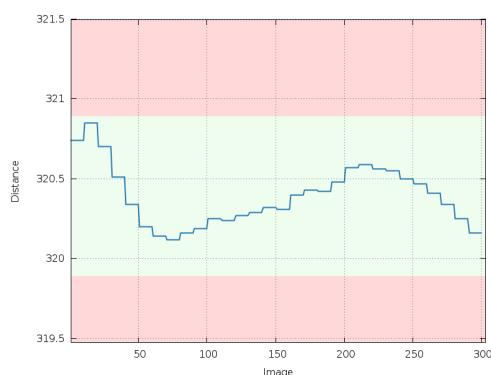


Fig.17 : (sweep 2a) refined crystal-to-detector distance as a function of image number

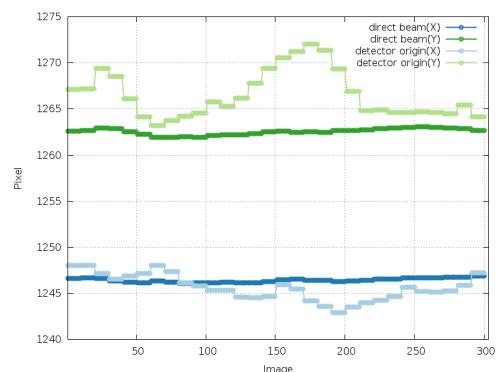


Fig.18 : (sweep 2a) direct beam position and detector origin as a function of image number

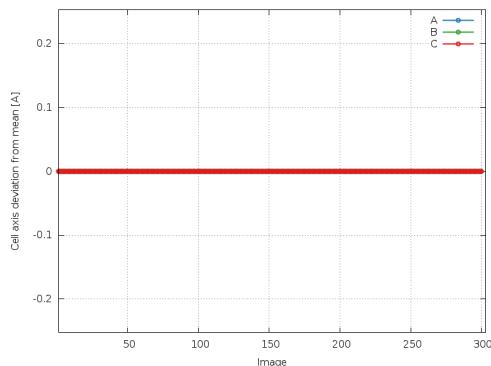


Fig.19 : (sweep 2a) deviation of refined cell axes relative to their mean (as a function of image number)

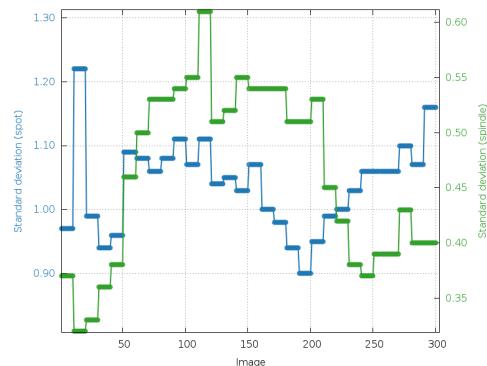


Fig.20 : (sweep 2a) standard deviation (spot position and spindle) as a function of image number

Data processing sweep 3a

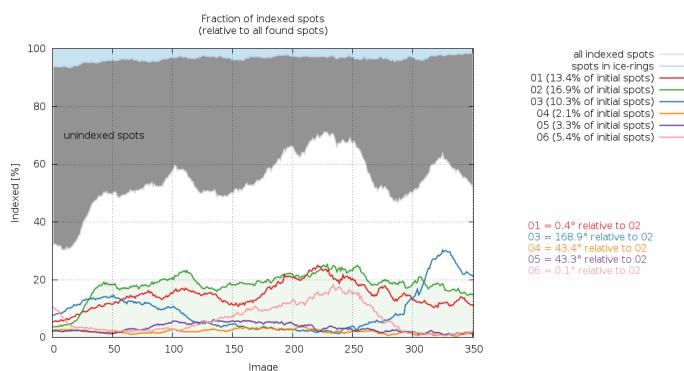


Fig.21 : (sweep 3a) number of spots for each indexing solution as a function of image number

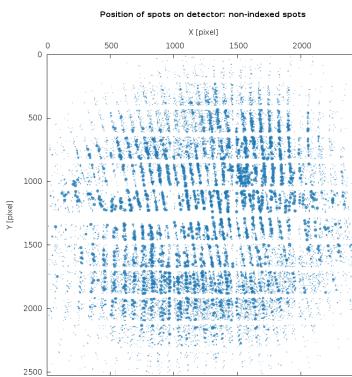


Fig.22 : (sweep 3a) unindexed spots as a function of detector position

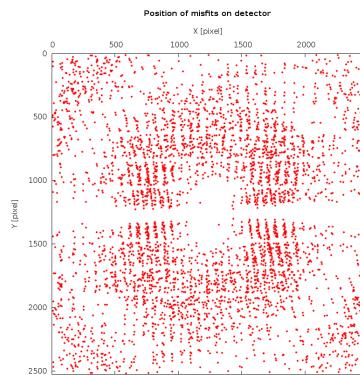


Fig.23 : (sweep 3a) reflections classified as misfits (as a function of detector position)

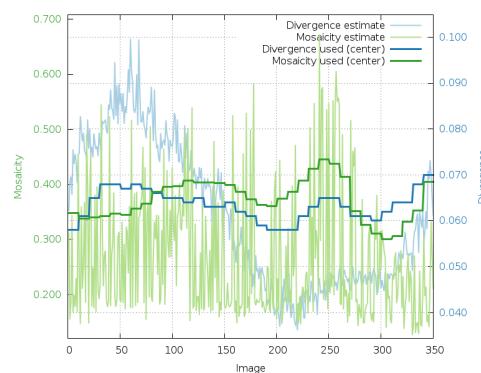


Fig.24 : (sweep 3a) divergence and mosaicty (estimated and used) as a function of image number

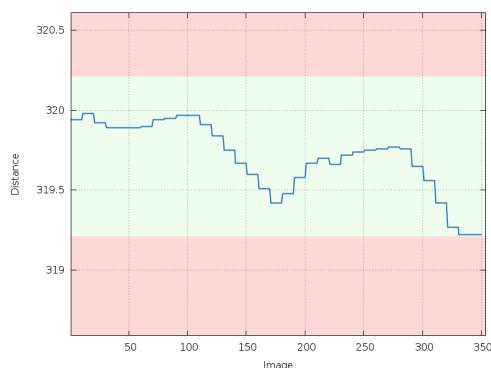


Fig.25 : (sweep 3a) refined crystal-to-detector distance as a function of image number

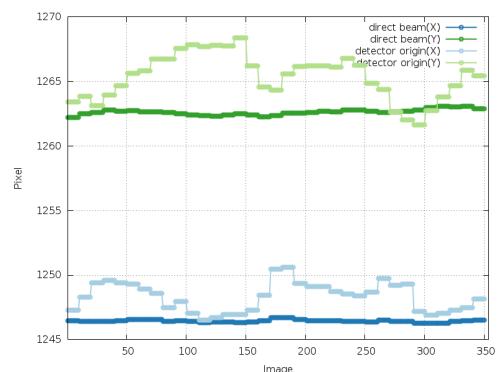


Fig.26 : (sweep 3a) direct beam position and detector origin as a function of image number

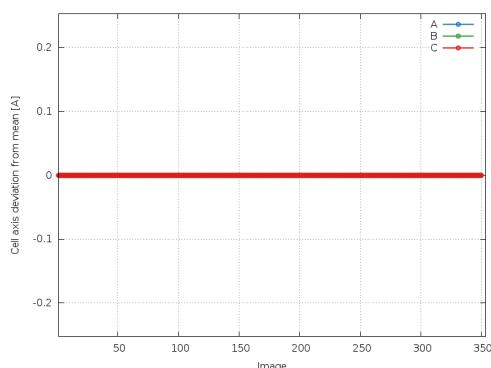


Fig.27 : (sweep 3a) deviation of refined cell axes relative to their mean (as a function of image number)

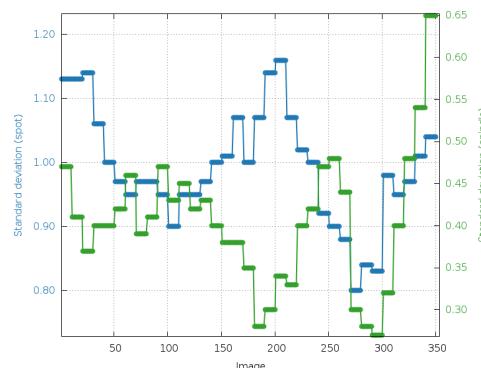


Fig.28 : (sweep 3a) standard deviation (spot position and spindle) as a function of image number

References

- autoPROC Vonrhein, C., Flensburg, C., Keller, P., Sharff, A., Smart, O., Paciorek, W., Womack, T. and Bricogne, G. (2011). Data processing and analysis with the autoPROC toolbox. *Acta Cryst. D67*, 293-302.
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- POINTLESS Evans, P.R. (2006). Scaling and assessment of data quality, *Acta Cryst. D62*, 72-82.
- AIMLESS Evans, P.R. and Murshudov, G.N. (2013). How good are my data and what is the resolution?, *Acta Cryst. D69*, 1204-1214.
- CCP4 Winn, M.D., Ballard, C.C., Cowtan, K.D. Dodson, E.J., Emsley, P., Evans, P.R., Keegan, R.M., Krissinel, E.B., Leslie, A.G.W., McCoy, A., McNicholas, S.J., Murshudov, G.N., Pannu, N.S., Potterton, E.A., Powell, H.R., Read, R.J., Vagin, A. and Wilson, K.S. (2011). Overview of the CCP4 suite and current developments, *Acta Cryst. D67*, 235-242.
- STARANISO Tickle, I.J., Flensburg, C., Keller, P., Paciorek, W., Sharff, A., Vonrhein, C., and Bricogne, G. (2020). STARANISO. Cambridge, United Kingdom: Global Phasing Ltd.