

C172C Correlation Report

General information

- Session info: <http://www3.mpifr-bonn.mpg.de/div/vlbi/globalmm/>
- Station feedback: http://www3.mpifr-bonn.mpg.de/div/vlbi/globalmm/sessions/sep17/feedback_sep17.asc
- C172C consists of only one subproject: MM012.
- Initial correlation was started with all stations and done up to and including scan No0126, second correlation (fixing Effelsberg incorrect channel order) was done without Mh and the KVN stations due to local cluster data loss and these stations having deleted their own copies of the data. Final version is a combination of these two correlations, with non-Ef baselines taken from the initial unfinished correlation and Ef baselines -- from the later one with Mh and the KVN stations missing. Thus there are no Ef-Mh baseline, and Mh is only present up to and including scan No0124. Since the KVN stations were starting later in the experiment than scan No0126, they were lost completely.

Fringes

Station	Code	Fringes	Plots	Comments
Ef	B	yes	<p>Fringe overview of all baselines including Ef in LL (left for each baseline) and RR (right for each baseline). Legend: white - scheduled, but no data, blue - no fringe, red-green - fringes of different quality. D -- fourfit error, in this case due to mixing upper and lower subbands in the KVN compatibility mode, no real problem with the data.</p> <p>c172c FRINGE RfAnt_Ef_LLRR_AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>EfGb, all pols:</p> <p>c172c_No0016_BLLAC_BG_LL.pdf, c172c_No0016_BLLAC_BG_LR.pdf, c172c_No0016_BLLAC_BG_RL.pdf, c172c_No0016_BLLAC_BG_RR.pdf</p> <p>EfGb, all pols, different source and time of the session:</p> <p>c172c_No0206_3C345_BG_LL.pdf, c172c_No0206_3C345_BG_LR.pdf, c172c_No0206_3C345_BG_RL.pdf, c172c_No0206_3C345_BG_RR.pdf</p> <p>EfPt, all pols:</p> <p>c172c_No0243_CTA102_Bp_LL.pdf, c172c_No0243_CTA102_Bp_LR.pdf, c172c_No0243_CTA102_Bp_RL.pdf, c172c_No0243_CTA102_Bp_RR.pdf</p>	<p>See general info about the missing Ef-Mh baseline. Effelsberg recorded with DBBC (Ef) and RDBE (Eb), but only Ef was correlated.</p> <p>Weather: very cloudy to overcast, some rain</p>
On	X	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c FRINGE RfAnt_On_LLRR_AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>EfOn, all pols:</p>	<p>See station feedback for detailed comments.</p>

Station	Code	Fringes	Plots	Comments
			<p>c172c_No0007_3C454.3_BX_LL.pdf, c172c_No0007_3C454.3_BX_LR.pdf, c172c_No0007_3C454.3_BX_RL.pdf, c172c_No0007_3C454.3_BX_RR.pdf</p> <p>GbOn, all pols:</p> <p>c172c_No0340_OJ287_GX_LL.pdf, c172c_No0340_OJ287_GX_LR.pdf, c172c_No0340_OJ287_GX_RL.pdf, c172c_No0340_OJ287_GX_RR.pdf</p>	
Ys	Y	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c_FRINGE_RfAnt_Ys_LLRR_AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>EfYs, all pols:</p> <p>c172c_No0198_3C345_BY_LL.pdf, c172c_No0198_3C345_BY_LR.pdf, c172c_No0198_3C345_BY_RL.pdf, c172c_No0198_3C345_BY_RR.pdf</p> <p>PtYs, LL and LR only:</p> <p>c172c_No0026_BLLAC_pY_LL.pdf, c172c_No0026_BLLAC_pY_LR.pdf</p>	<p>As usual, Ys observed LCP only, but it was also recorded as fake RCP, that's why there are common Ys "right" to other antenna's left fringes.</p> <p>Possible problems by the end of the experiment.</p>
Mh	Z	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c_FRINGE_RfAnt_Mh_LLRR_AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>MhPv, all pols:</p> <p>c172c_No0114_1055+018_ZP_LL.pdf, c172c_No0114_1055+018_ZP_LR.pdf, c172c_No0114_1055+018_ZP_RL.pdf, c172c_No0114_1055+018_ZP_RR.pdf</p> <p>GbMh, || pols:</p> <p>c172c_No0031_BLLAC_GZ_LL.pdf, c172c_No0031_BLLAC_GZ_RR.pdf</p>	<p>Present only up to scan No0124, see general info.</p>
Gb	G	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c_FRINGE_RfAnt_Gb_LLRR_AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>GbNl, all pols:</p> <p>c172c_No0031_BLLAC_Gn_LL.pdf, c172c_No0031_BLLAC_Gn_LR.pdf, c172c_No0031_BLLAC_Gn_RL.pdf, c172c_No0031_BLLAC_Gn_RR.pdf</p> <p>GbOn, all pols:</p>	<p>See station feedback for detailed comments.</p>

Station	Code	Fringes	Plots	Comments
			c172c_No0231_3C454.3_GX_LL.pdf , c172c_No0231_3C454.3_GX_LR.pdf , c172c_No0231_3C454.3_GX_RL.pdf , c172c_No0231_3C454.3_GX_RR.pdf	
Pv	P	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c_FRINGE_RfAnt_Pv_LLRR_AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>EfPv, all pols:</p> <p>c172c_No0174_3C345_BP_LL.pdf, c172c_No0174_3C345_BP_LR.pdf, c172c_No0174_3C345_BP_RL.pdf, c172c_No0174_3C345_BP_RR.pdf</p> <p>PtPv, all pols:</p> <p>c172c_No0264_3C454.3_pP_LL.pdf, c172c_No0264_3C454.3_pP_LR.pdf, c172c_No0264_3C454.3_pP_RL.pdf, c172c_No0264_3C454.3_pP_RR.pdf</p>	For a significant part of the experiment very cloudy to overcast. PWV ~10mm by the end of the experiment.
Br	b	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c_FRINGE_RfAnt_Br_LLRR_AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>BrEf, all pols:</p> <p>c172c_No0238_CTA102_bB_LL.pdf, c172c_No0238_CTA102_bB_LR.pdf, c172c_No0238_CTA102_bB_RL.pdf, c172c_No0238_CTA102_bB_RR.pdf</p> <p>BrKp, all pols:</p> <p>c172c_No0264_3C454.3_bk_LL.pdf, c172c_No0264_3C454.3_bk_LR.pdf, c172c_No0264_3C454.3_bk_RL.pdf, c172c_No0264_3C454.3_bk_RR.pdf</p>	
Fd	f	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c_FRINGE_RfAnt_Fd_LLRR_AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>FdGb, all pols:</p> <p>c172c_No0473_1510-089_fG_LL.pdf, c172c_No0473_1510-089_fG_LR.pdf, c172c_No0473_1510-089_fG_RL.pdf, c172c_No0473_1510-089_fG_RR.pdf</p> <p>FdLa, || pols:</p> <p>c172c_No0452_1510-089_fl_LL.pdf, c172c_No0452_1510-089_fl_RR.pdf</p>	<p>For the most part of the experiment communications were out and antenna was not properly pointed. Only the last several scans (beginning with No0438) are good.</p> <p>LCP Tsys higher than RCP.</p>

Station	Code	Fringes	Plots	Comments
Kp	k	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c FRINGE RfAnt Kp LLRR AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>EfKp, || pols:</p> <p>c172c No0233 CTA102 Bk LL.pdf, c172c No0233 CTA102 Bk RR.pdf</p> <p>KpOv, all pols:</p> <p>c172c No0264 3C454.3 ko LL.pdf, c172c No0264 3C454.3 ko LR.pdf, c172c No0264 3C454.3 ko RL.pdf, c172c No0264 3C454.3 ko RR.pdf</p>	Commercial power outage for several scans (No0435 - No0452), antenna stowed.
La	l	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c FRINGE RfAnt La LLRR AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>EfLa, all pols:</p> <p>c172c No0238 CTA102 Bl LL.pdf, c172c No0238 CTA102 Bl LR.pdf, c172c No0238 CTA102 Bl RL.pdf, c172c No0238 CTA102 Bl RR.pdf</p> <p>LaPt, all pols:</p> <p>c172c No0097 3C120 lp LL.pdf, c172c No0097 3C120 lp LR.pdf, c172c No0097 3C120 lp RL.pdf, c172c No0097 3C120 lp RR.pdf</p>	Some rain (~274d00h12m)
Mk	m	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c FRINGE RfAnt Mk LLRR AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>EfMk, || pols:</p> <p>c172c No0203 3C345 Bm LL.pdf, c172c No0203 3C345 Bm RR.pdf</p> <p>GbMk, all pols:</p> <p>c172c No0281 CTA102 Gm LL.pdf, c172c No0281 CTA102 Gm LR.pdf, c172c No0281 CTA102 Gm RL.pdf, c172c No0281 CTA102 Gm RR.pdf</p>	Taken out for a few scans because of USNO observing.
Nl	n	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c FRINGE RfAnt Nl LLRR AllSrc.pdf</p>	

Station	Code	Fringes	Plots	Comments
			<p>Examples of fourfit fringe plots:</p> <p>NlOn, all pols:</p> <p>c172c No0238 CTA102 nX LL.pdf, c172c No0238 CTA102 nX LR.pdf, c172c No0238 CTA102 nX RL.pdf, c172c No0238 CTA102 nX RR.pdf</p> <p>NlOv, || pols:</p> <p>c172c No0097 3C120 no LL.pdf, c172c No0097 3C120 no RR.pdf</p>	
Ov	o	yes	<p>Fringe overview (see Ef for explanations):</p> <p>/c172c FRINGE RfAnt Ov LLRR AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>GbOv, all pols:</p> <p>c172c No0046 BLLAC Go LL.pdf, c172c No0046 BLLAC Go LR.pdf, c172c No0046 BLLAC Go RL.pdf, c172c No0046 BLLAC Go RR.pdf</p> <p>LaOv, all pols:</p> <p>c172c No0189 3C345 lo LL.pdf, c172c No0189 3C345 lo LR.pdf, c172c No0189 3C345 lo RL.pdf, c172c No0189 3C345 lo RR.pdf</p>	High RCP Tsys
Pt	p	yes	<p>Fringe overview (see Ef for explanations):</p> <p>c172c FRINGE RfAnt Pt LLRR AllSrc.pdf</p> <p>Examples of fourfit fringe plots:</p> <p>GbPt, all pols:</p> <p>c172c No0046 BLLAC Gp LL.pdf, c172c No0046 BLLAC Gp LR.pdf, c172c No0046 BLLAC Gp RL.pdf, c172c No0046 BLLAC Gp RR.pdf</p> <p>EfPt, all pols:</p> <p>c172c No0243 CTA102 Bp LL.pdf, c172c No0243 CTA102 Bp LR.pdf, c172c No0243 CTA102 Bp RL.pdf, c172c No0243 CTA102 Bp RR.pdf</p>	Taken out for several scans because of USNO observing.
KVN: Kt, Ku, Ky	t, u, y	yes	-	There were some fringes found during the pre-correlation clock search, but due to the local cluster data loss and the stations deleting their own copies of the data (see the General Information above), no KVN data was included in the final correlation product.

Notes

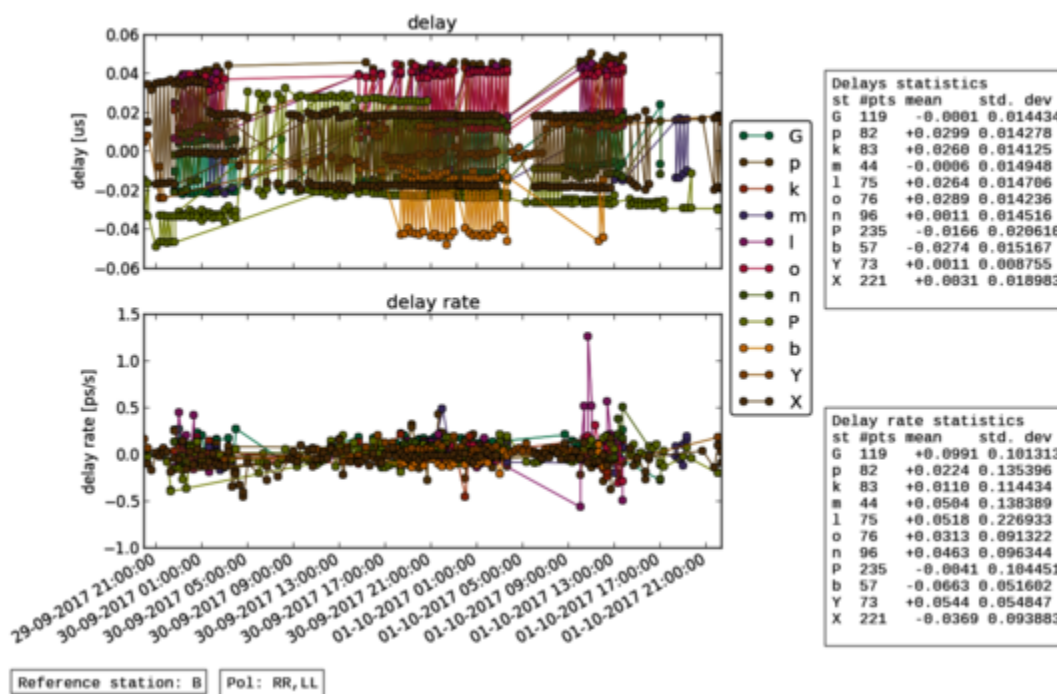
Precorrelation

- OV - in the beginning only two modules (JOD+0090 JOD+0096) arrived, containing scans up to No0232, 10nov17 P. Perley confirmed a third OV module was found and it was sent to MPIfR.
- KVN : some fringes inside KVN within $\pm 32\mu\text{sec}$ and $\pm 1\text{sec}$; station positions and freq setup appear correct
- KVN Ky : transferred files are those of Ulsan rather than Yonsei (retransferred)
- KVN Kt : no fringes (asked for operator log files, the automatic log files show no error)

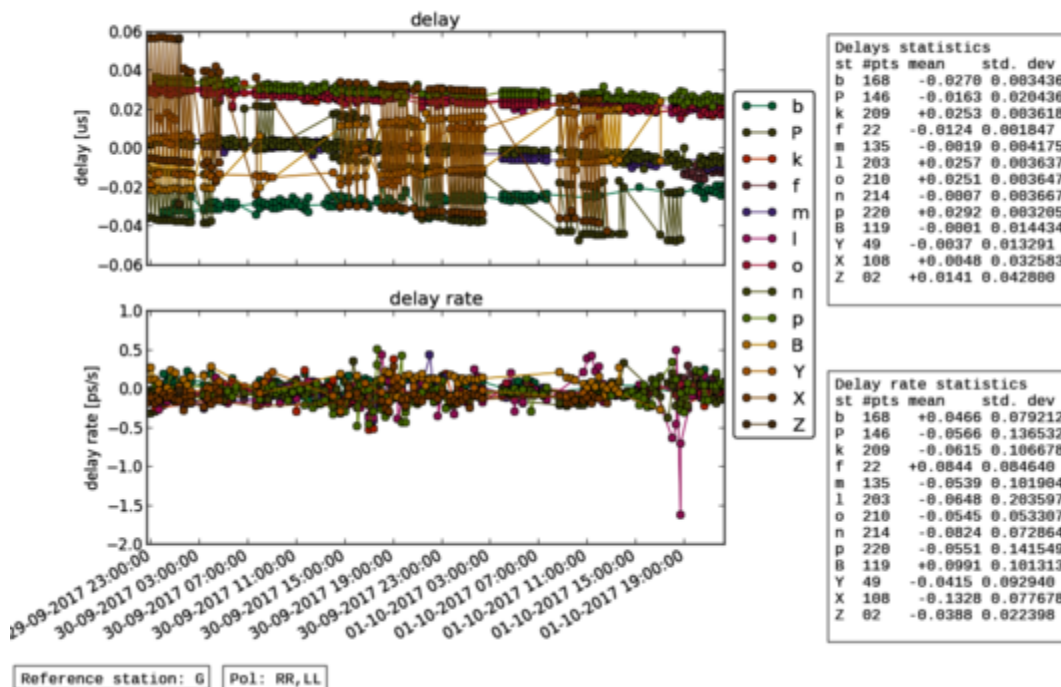
Post-Correlation checks

Residuals

Reference B (Ef), RR and LL:



Reference G (Gb), RR and LL:



FITS completeness (plist)

		EB	EF	ON	YS	PV	MH	GB	FD	NL	OV	PT	BR	KP	LA	MK	KY	KU	KT
No0001	BLLAC 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0002	BLLAC 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0003	BLLAC 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0004	BLLAC 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0005	BLLAC 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0006	3C454.3 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0007	3C454.3 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0008	BLLAC 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0009	BLLAC 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0010	BLLAC 3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.
No0011	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0012	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0013	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0014	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0015	BLLAC 3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.
No0016	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0017	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0018	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0019	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0020	BLLAC 3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.
No0021	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0022	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0023	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0024	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0025	BLLAC 3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.
No0026	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.

No0027	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0028	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0029	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0030	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.
No0031	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0032	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0033	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0034	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0035	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.
No0036	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0037	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0038	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0039	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0040	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.
No0041	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0042	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0043	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0044	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0045	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.
No0046	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0047	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0048	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0049	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0050	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.
No0051	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0052	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0053	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0054	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0055	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.
No0056	BLLAC 3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0057	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0058	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0059	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0060	3C120 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0061	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.
No0062	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0063	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0064	3C120 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0065	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0066	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0067	3C120 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0068	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.
No0069	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0070	BLLAC 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	.	.	.	.
No0071	3C120 3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	.	.	.	.
No0072	3C120 3mm_RDBE	.	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.
No0073	3C120 3mm_RDBE	x	x	x	x	x	x	x	x	.	x	.	x	x	.	.	.	.	.
No0074	3C120 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	.	x	.	x	.	.	.	.
No0075	3C120 3mm_RDBE	x	x	x	x	x	x	x	x	.	x	.	x	.	x	.	.	.	.
No0076	3C120 3mm_RDBE	.	.	.	.	.	.	.	.	x	x	.	x	.	x	.	.	.	.

No0077	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	.	.	.	.	.	.	.	.	.
No0078	3C120	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.
No0079	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0080	3C120	3mm_RDBE	x	x	x	x	x	.	X	X	X	X	X	X	X	X	.	.	.
No0081	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0082	3C120	3mm_RDBE	.	.	.	.	.	.	X	.	.	.	.	.	.	.	.	.	.
No0083	3C120	3mm_RDBE	x	x	x	x	x	.	X	X	X	X	X	X	X	X	.	.	.
No0084	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0085	3C120	3mm_RDBE	x	x	.	X	X	.	X	X	X	X	X	X	X	X	.	.	.
No0086	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0087	3C120	3mm_RDBE	.	.	.	.	.	.	X	.	.	.	.	.	.	.	.	.	.
No0088	3C120	3mm_RDBE	x	x	.	X	X	.	X	X	X	X	X	X	X	X	.	.	.
No0089	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0090	3C120	3mm_RDBE	.	.	X	X	.	X	X	X	X	X	X	X	X	X	.	.	.
No0091	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0092	1055+018	3mm_RDBE	x	x	x	.	.	X	.	.	.	.	.	.	.	.	.	.	.
No0093	3C120	3mm_RDBE	.	.	.	.	.	.	X	.	.	.	.	.	.	.	.	.	.
No0094	3C120	3mm_RDBE	.	.	X	X	.	X	X	X	X	X	X	X	X	X	.	.	.
No0095	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0096	1055+018	3mm_RDBE	x	x	x	.	.	X	.	.	.	.	.	.	.	.	.	.	.
No0097	3C120	3mm_RDBE	.	.	.	.	.	.	X	X	X	X	X	X	X	X	.	.	.
No0098	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0099	3C120	3mm_RDBE	.	.	.	.	.	.	X	.	.	.	.	.	.	.	.	.	.
No0100	1055+018	3mm_RDBE	x	x	x	X	X	X	.	.	.	.	.	.	.	.	.	.	.
No0101	3C120	3mm_RDBE	.	.	.	.	.	.	X	X	X	X	X	X	X	X	.	.	.
No0102	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0103	1055+018	3mm_RDBE	x	x	x	X	X	X	.	.	.	.	.	.	.	.	.	.	.
No0104	3C120	3mm_RDBE	.	.	.	.	.	.	X	X	X	X	X	X	X	X	.	.	.
No0105	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0106	3C120	3mm_RDBE	.	.	.	.	.	.	X	.	.	.	.	.	.	.	.	.	.
No0107	1055+018	3mm_RDBE	x	x	x	X	X	X	.	.	.	.	.	.	.	.	.	.	.
No0108	3C120	3mm_RDBE	.	.	.	.	.	.	X	X	X	X	X	X	X	X	.	.	.
No0109	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0110	1055+018	3mm_RDBE	x	x	x	X	X	X	.	.	.	.	.	.	.	.	.	.	.
No0111	3C120	3mm_RDBE	.	.	.	.	.	.	X	.	.	.	.	.	.	.	.	.	.
No0112	3C120	3mm_RDBE	.	.	.	.	.	.	X	X	X	X	X	X	X	X	.	.	.
No0113	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0114	1055+018	3mm_RDBE	x	x	x	X	X	X	.	.	.	.	.	.	.	.	.	.	.
No0115	3C120	3mm_RDBE	.	.	.	.	.	.	X	X	X	X	X	X	X	X	.	.	.
No0116	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0117	1055+018	3mm_RDBE	x	x	x	X	X	X	.	.	.	.	.	.	.	.	.	.	.
No0118	3C120	3mm_RDBE	.	.	.	.	.	.	X	.	.	.	.	.	.	.	.	.	.
No0119	3C120	3mm_RDBE	.	.	.	.	.	.	X	X	X	X	X	X	X	X	.	.	.
No0120	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0121	1055+018	3mm_RDBE	x	x	x	X	X	X	.	.	.	.	.	.	.	.	.	.	.
No0122	3C120	3mm_RDBE	.	.	.	.	.	.	X	X	X	X	X	X	X	X	.	.	.
No0123	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.
No0124	1156+295	3mm_RDBE	x	x	x	X	X	X	.	.	.	.	.	.	.	.	.	.	.
No0125	3C120	3mm_RDBE	.	.	.	.	.	.	X	.	.	.	.	.	.	.	.	.	.
No0126	3C120	3mm_RDBE	.	.	.	.	.	.	.	X	X	X	X	X	X	X	.	.	.

No0127	3C120	3mm_RDBE	.	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0128	1055+018	3mm_RDBE	x	x	x	x	x	x
No0129	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0130	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0131	1055+018	3mm_RDBE	x	x	x	x	x	x
No0132	3C120	3mm_RDBE	x
No0133	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0134	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0135	1156+295	3mm_RDBE	x	x	x	x	x	x
No0136	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0137	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0138	1055+018	3mm_RDBE	x	x	x	x	x	x
No0139	3C120	3mm_RDBE	x
No0140	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0141	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0142	1055+018	3mm_RDBE	x	x	x	x	x
No0143	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0144	3C120	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0145	1156+295	3mm_RDBE	x	x	x	x	x	x
No0146	1055+018	3mm_RDBE	x
No0147	1055+018	3mm_RDBE	x	x	x	x	x	.	x	x	x	x	x	x	x	x	x	.	.	.	.
No0148	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0149	1055+018	3mm_RDBE	x	x	x	x	x	.	x	x	x	x	x	x	x	x	x	.	.	.	.
No0150	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0151	1156+295	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0152	1156+295	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0153	1055+018	3mm_RDBE	x
No0154	1055+018	3mm_RDBE	.	.	x	x	.	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0155	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0156	1156+295	3mm_RDBE	x	x	x	.	.	x
No0157	1156+295	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0158	1156+295	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0159	1055+018	3mm_RDBE	x
No0160	1055+018	3mm_RDBE	.	.	x	x	.	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0161	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0162	1156+295	3mm_RDBE	x	x	x	.	.	x
No0163	1156+295	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0164	1156+295	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0165	1055+018	3mm_RDBE	x
No0166	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0167	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0168	1156+295	3mm_RDBE	x	x	x	x	x	x
No0169	1156+295	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.
No0170	1156+295	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0171	1055+018	3mm_RDBE	x
No0172	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0173	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0174	3C345	3mm_RDBE	x	x	x	x	x	x
No0175	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.
No0176	1055+018	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	x	.	.	.	.

No0227	3C454.3	3mm_RDBE	x	x	x	x	x	x	x	.	x	.	.	.	.	.	.	.	.	.	.
No0228	3C345	3mm_RDBE	.	.	.	.	.	.	.	x	.	x	x	x	x	x	x	.	.	.	.
No0229	3C345	3mm_RDBE	.	.	.	.	.	.	.	x	.	x	x	x	x	x	x	.	.	.	.
No0230	3C454.3	3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.	.
No0231	3C454.3	3mm_RDBE	x	x	x	x	x	x	x	x	x	.	x	x	x	x	.	.	.	.	.
No0232	3C454.3	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0233	CTA102	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.	.
No0234	CTA102	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0235	3C454.3	3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.	.
No0236	3C454.3	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.	.
No0237	3C454.3	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0238	CTA102	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.	.
No0239	CTA102	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0240	3C454.3	3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.	.
No0241	3C454.3	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.	.
No0242	3C454.3	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0243	CTA102	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.	.
No0244	CTA102	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0245	3C454.3	3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.	.
No0246	3C454.3	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.	.
No0247	3C454.3	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0248	OJ287	3mm_RDBE	x	x	x
No0249	CTA102	3mm_RDBE	x	x	x	x	x	.	x	x	x	x	x	x	x	x	.	.	.	.	.
No0250	CTA102	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0251	OJ287	3mm_RDBE	x	x	x
No0252	3C454.3	3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.	.
No0253	3C454.3	3mm_RDBE	x	x	x	x	x	x	x	x	x	x	x	x	x	x	.	.	.	.	.
No0254	3C454.3	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0255	OJ287	3mm_RDBE	x	x	x
No0256	CTA102	3mm_RDBE	x	x	.	x	x	.	x	x	x	x	x	x	x	x	.	.	.	.	.
No0257	CTA102	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0258	OJ287	3mm_RDBE	.	x	.	.	x	x	x	x
No0259	3C454.3	3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.	.
No0260	3C454.3	3mm_RDBE	x	x	.	x	x	.	x	x	x	x	x	x	x	x	.	.	.	.	.
No0261	3C454.3	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0262	OJ287	3mm_RDBE	.	x	.	.	x	x	x	x
No0263	3C454.3	3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.	.
No0264	3C454.3	3mm_RDBE	x	x	.	x	x	.	x	x	x	x	x	x	x	x	.	.	.	.	.
No0265	3C454.3	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0266	OJ287	3mm_RDBE	.	x	.	.	x	x	x	x
No0267	CTA102	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0268	CTA102	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0269	OJ287	3mm_RDBE	x	x	x	x	x	x	x	x	x
No0270	3C454.3	3mm_RDBE	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.	.	.
No0271	3C454.3	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0272	3C454.3	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0273	OJ287	3mm_RDBE	x	x	x	x	x	x	x	x	x
No0274	CTA102	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0275	CTA102	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.	.
No0276	OJ287	3mm_RDBE	x	x	x	x	x	x	x	x	x

No0427	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	.	x	.	x	x	.	.	.	.
No0428	0716+714	3mm_RDBE	x	x	x	.	.	x	.	.	.	x	.	x	.	.	x	x	x	x
No0429	0716+714	3mm_RDBE	.	.	.	.	.	.	.	.	.	x	.	x	.	.	x	x	x	x
No0430	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.
No0431	1510-089	3mm_RDBE	.	.	.	x	x	.	x	x	x	x	x	x	x	x	.	.	.	.
No0432	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0433	0716+714	3mm_RDBE	x	x	x	.	.	x	.	.	.	.	.	.	.	.	x	x	x	x
No0434	1510-089	3mm_RDBE	.	.	.	x	x	.	x	x	x	x	x	x	x	x	.	.	.	.
No0435	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0436	0716+714	3mm_RDBE	x	x	x	.	.	x	.	.	.	.	.	.	.	.	x	x	x	x
No0437	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.
No0438	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0439	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0440	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0441	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0442	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0443	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0444	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.
No0445	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0446	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0447	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0448	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0449	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0450	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0451	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.
No0452	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0453	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0454	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0455	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0456	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0457	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0458	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.
No0459	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0460	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0461	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0462	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0463	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0464	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0465	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.
No0466	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0467	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0468	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0469	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0470	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0471	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x
No0472	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	.	.	.	.	.	.	.	.	.	.
No0473	1510-089	3mm_RDBE	.	.	.	.	.	.	.	x	x	x	x	x	x	x	.	.	.	.
No0474	0716+714	3mm_RDBE	x	x	x	x	x	x	.	.	.	.	.	.	.	.	x	x	x	x