

KIC 007269493

Q1-17 DR25 TCE Parameters

TCE	Run Type	KOI?	Period (Days)	Epoch (BKJD)	Depth (ppm)	Duration (Hours)	MES	SNR	R_{\star} (R_{\odot})	T_{\star} (K)	R_p (R_{\oplus})	S_p (S_{\oplus})
007269493-01	OBS	1961.01	1.907813	131.637740	124.5	1.881	39.5	45.5	0.82	5435	1.11	611.31

Robovetter Results

TCE	Run Type	Disp	Score	N	S	C	E	Comments
007269493-01	OBS	PC	1.00	0	0	0	0	NO_COMMENT

Notes: OBS = Observed. INJ = Injected. INV = Inverted. SCR = Scrambled.

N = Not Transit-Like. S = Stellar Eclipse. C = Centroid Offset. E = Ephemeris Match.

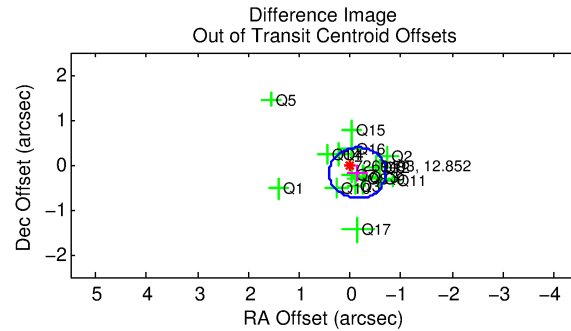
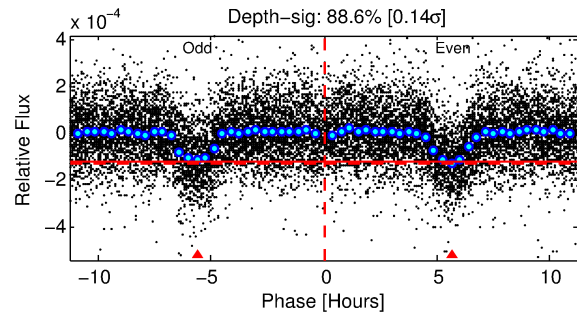
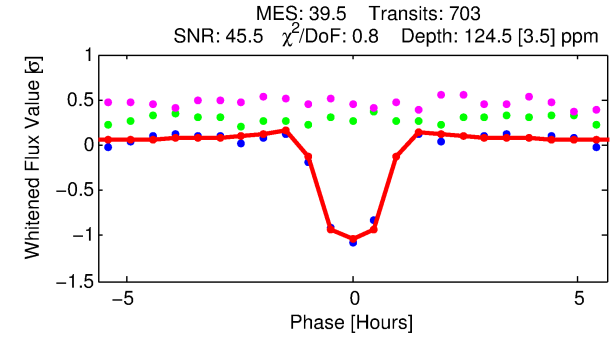
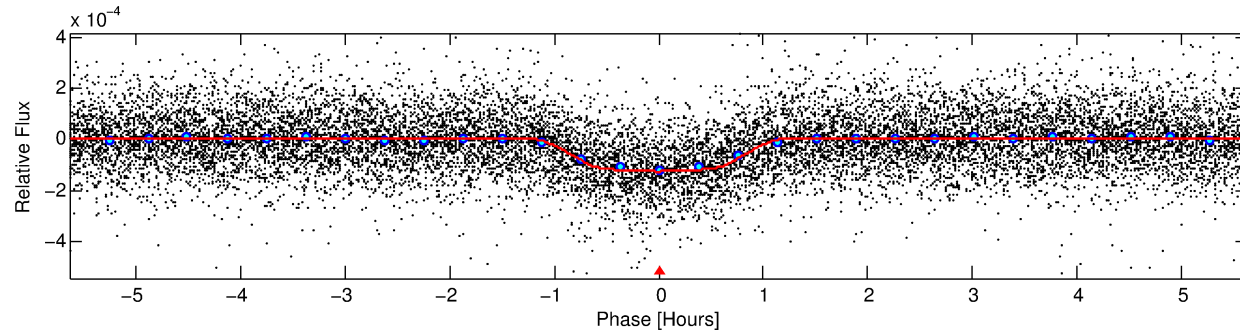
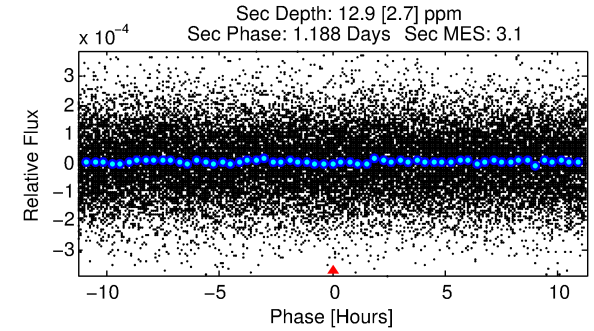
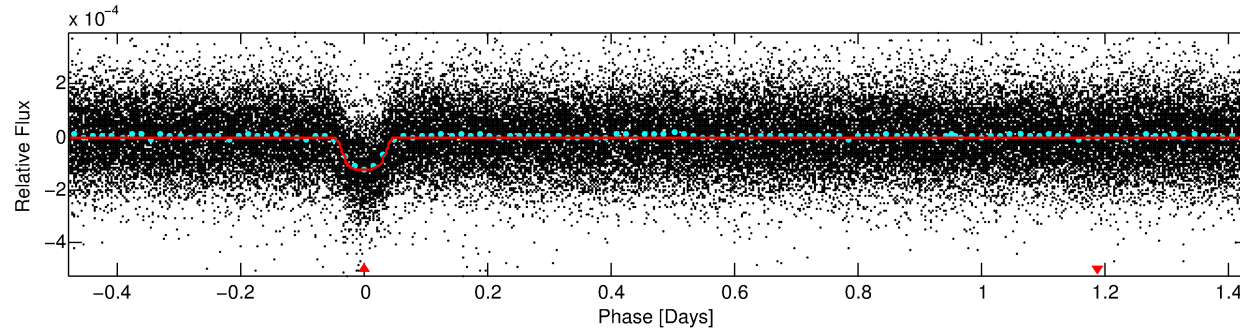
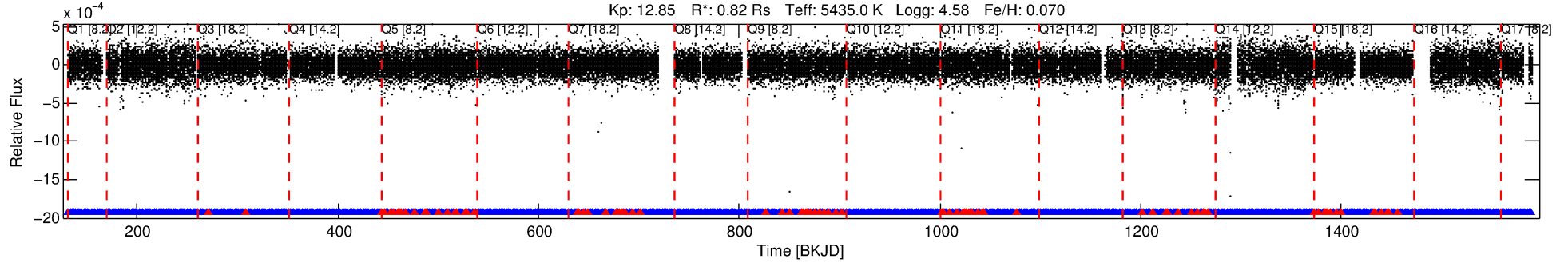
See http://exoplanetarchive.ipac.caltech.edu/docs/API_kepcandidate_columns.html#proj_disp_col for comment definitions.

Ephemeris Match Information For 007269493-01

No Significant Match Found

DV One-Page Summary

KIC: 7269493 Candidate: 1 of 1 Period: 1.908 d
KOI: K01961.01 Corr: 0.981



DV Fit Results:

Period = 1.90781 [0.00000] d
Epoch = 131.6377 [0.0006] BKJD
Rp/R* = 0.0123 [0.0023]
a/R* = 3.71 [2.86]
b = 0.90 [0.18]
Seff = 611.31 [112.35]
Teq = 1268 [58] K
Rp = 1.11 [0.24] Re
a = 0.0295 [0.0030] AU
Ag = 5.00 [2.31] [1.73σ]
Teffp = 2932 [324] K [5.06σ]

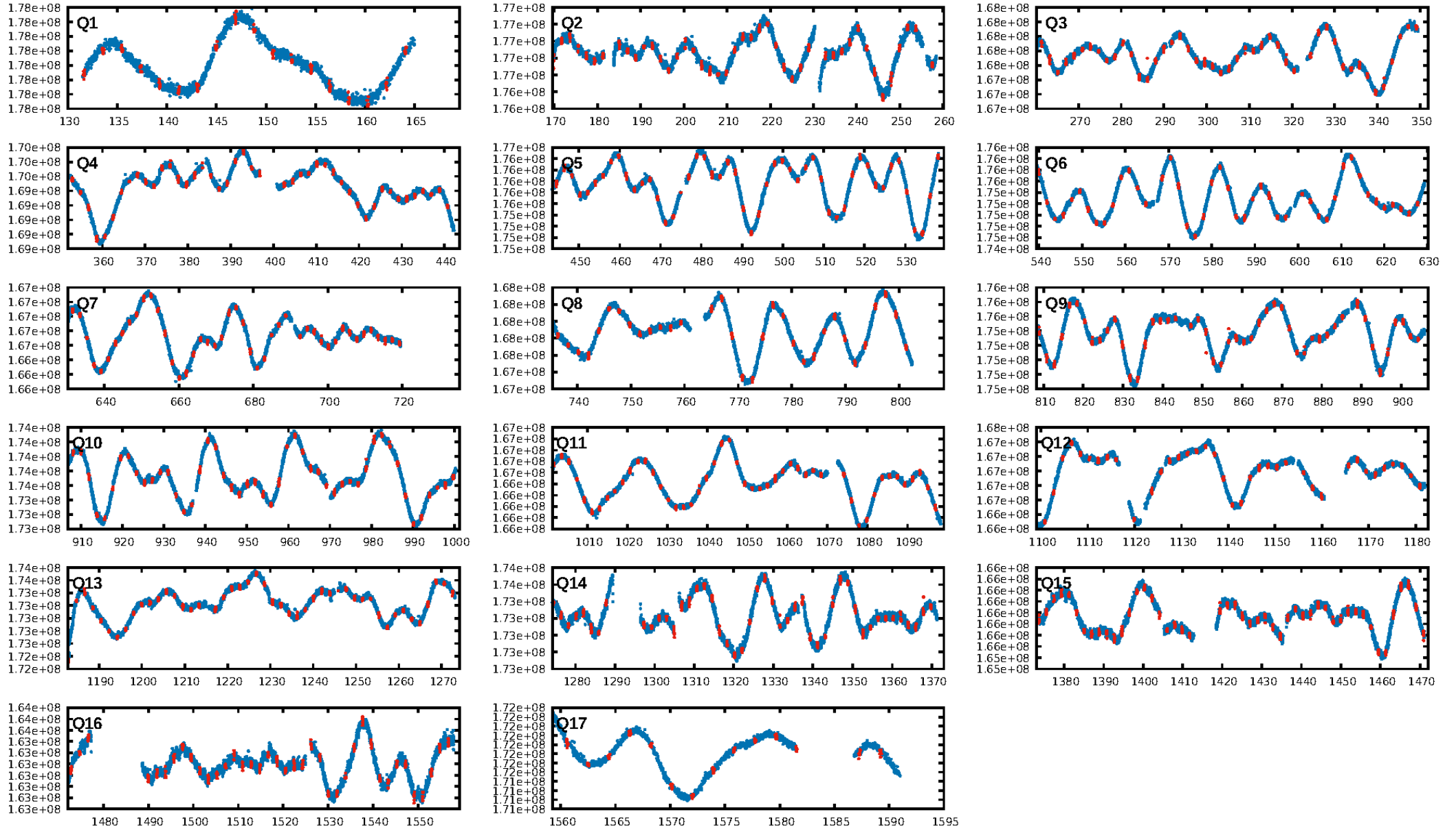
DV Diagnostic Results:

ShortPeriod-sig: N/A
LongPeriod-sig: N/A
ModelChiSquare2-sig: N/A
ModelChiSquareGof-sig: N/A
Bootstrap-pfa: 0.00e+00
RollingBand-fgt: 0.88 [589/671]
GhostDiagnostic-chr: 6.888
Centroid-sig: 14.8%
Centroid-so: 0.331 arcsec [1.44σ]
OotOffset-rm: 0.236 arcsec [1.26σ]
KicOffset-rm: 0.274 arcsec [1.50σ]
OotOffset-st: 4/4/4/5 [17]
KicOffset-st: 4/4/4/5 [17]
DiffImageQuality-fgm: 1.00 [17/17]
DiffImageOverlap-fno: 1.00 [17/17]

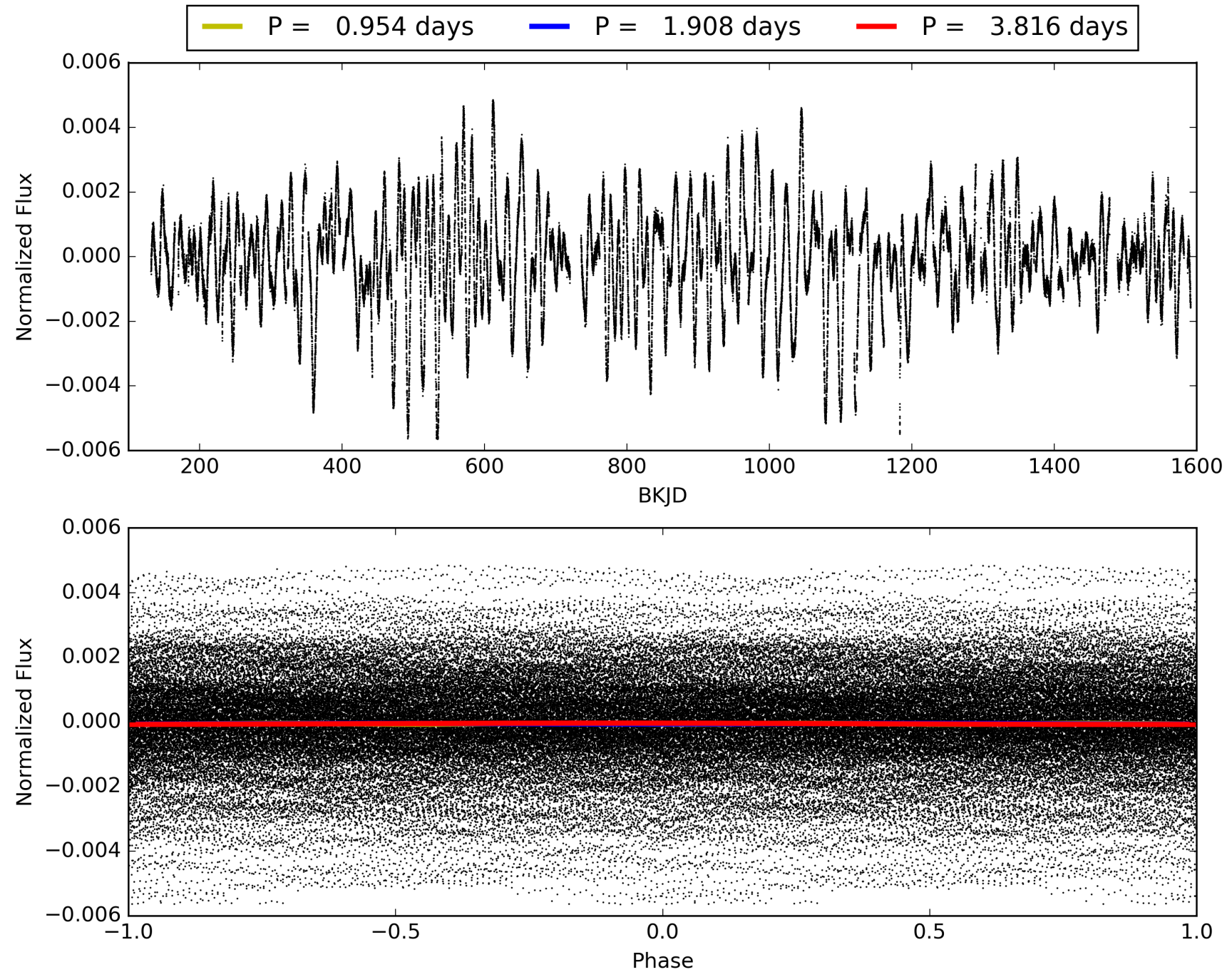
Software Revision: svn+ssh://murzim/repo/soc/tags/release/9.3.42@60958 -- Date Generated: 31-Jan-2016 19:30:25 Z

This Data Validation Report Summary was produced in the Kepler Science Operations Center Pipeline at NASA Ames Research Center

TCE 007269493-01, PDC Light Curves

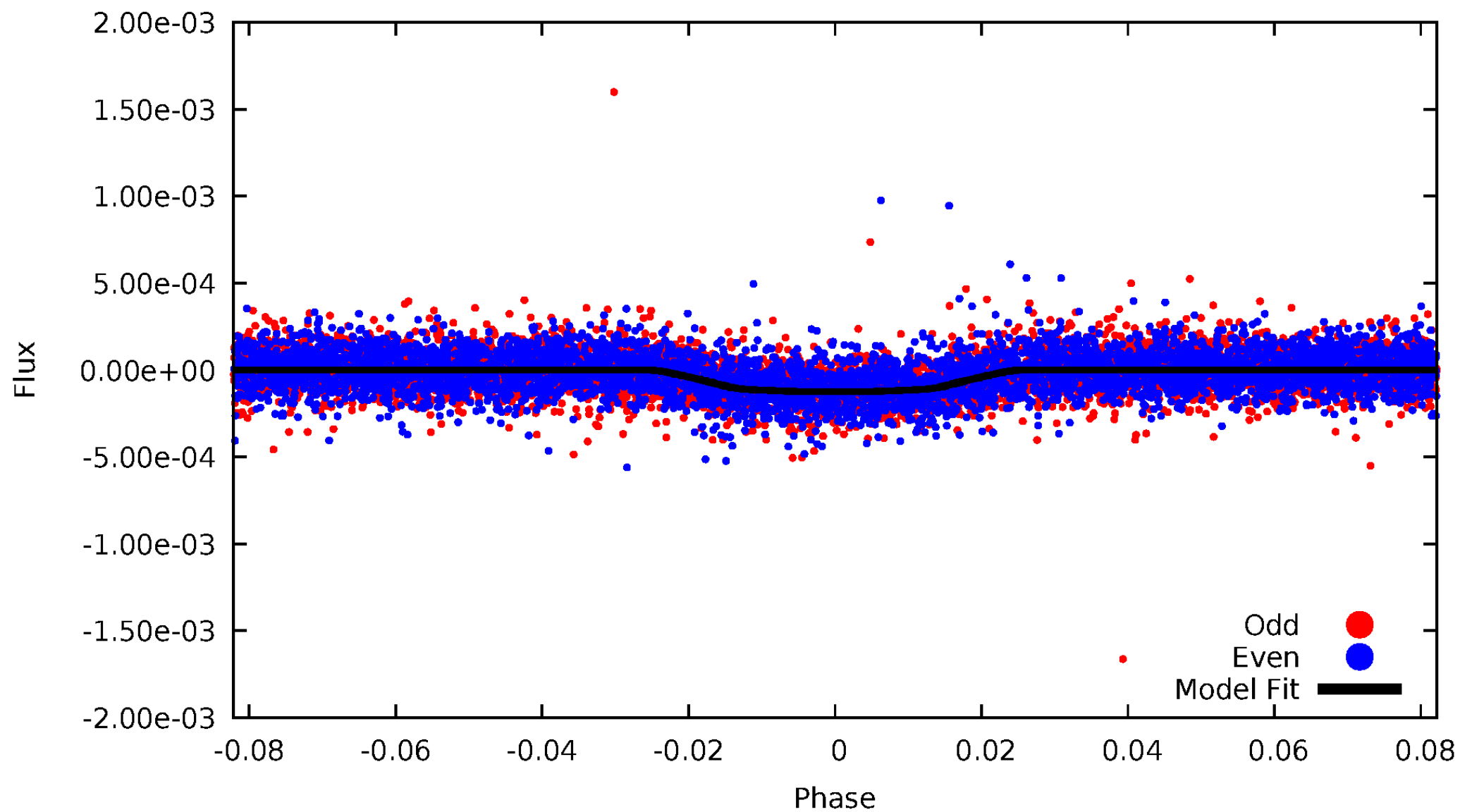


TCE 007269493-01



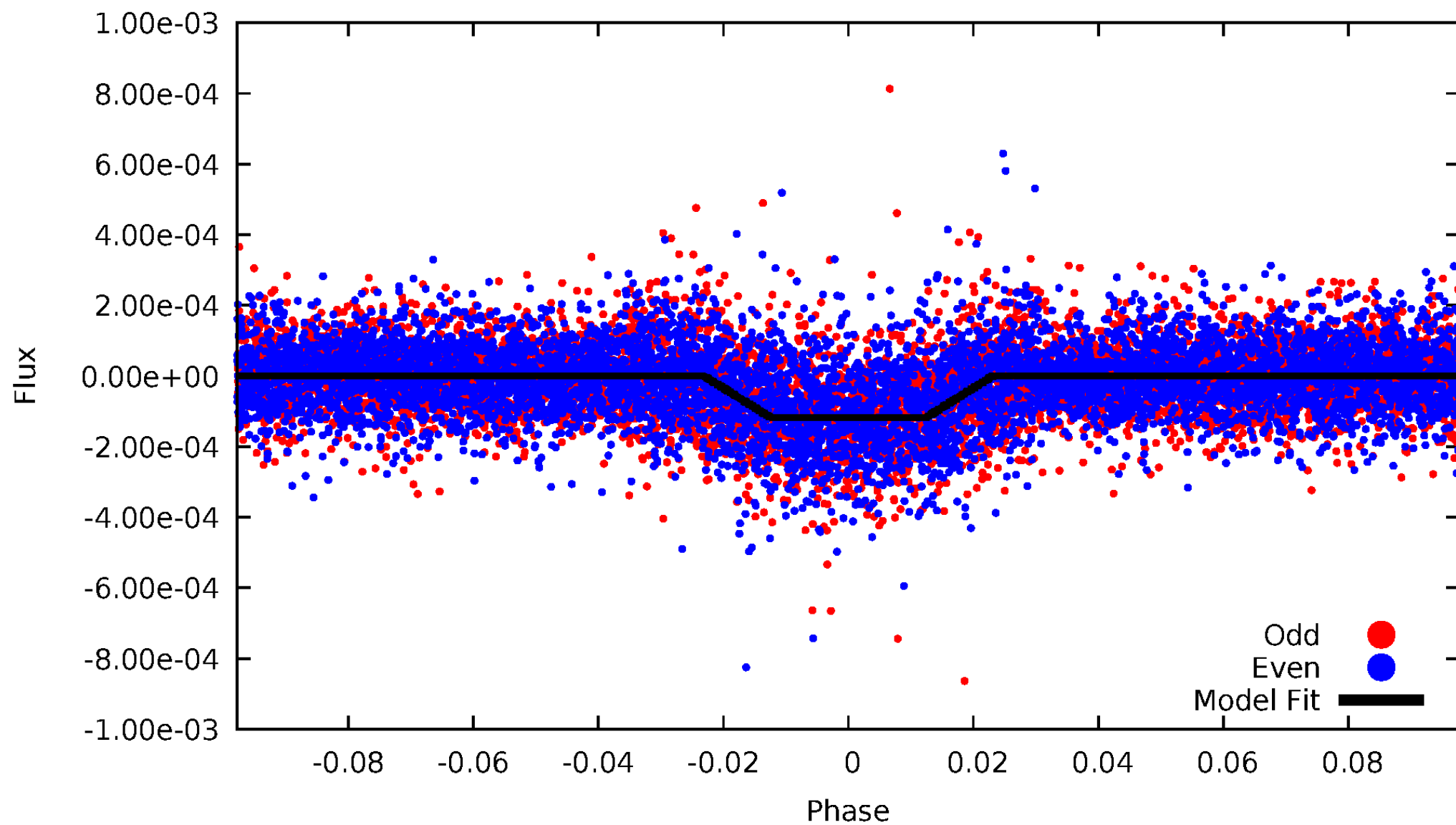
DV Odd/Even

TCE 007269493-01

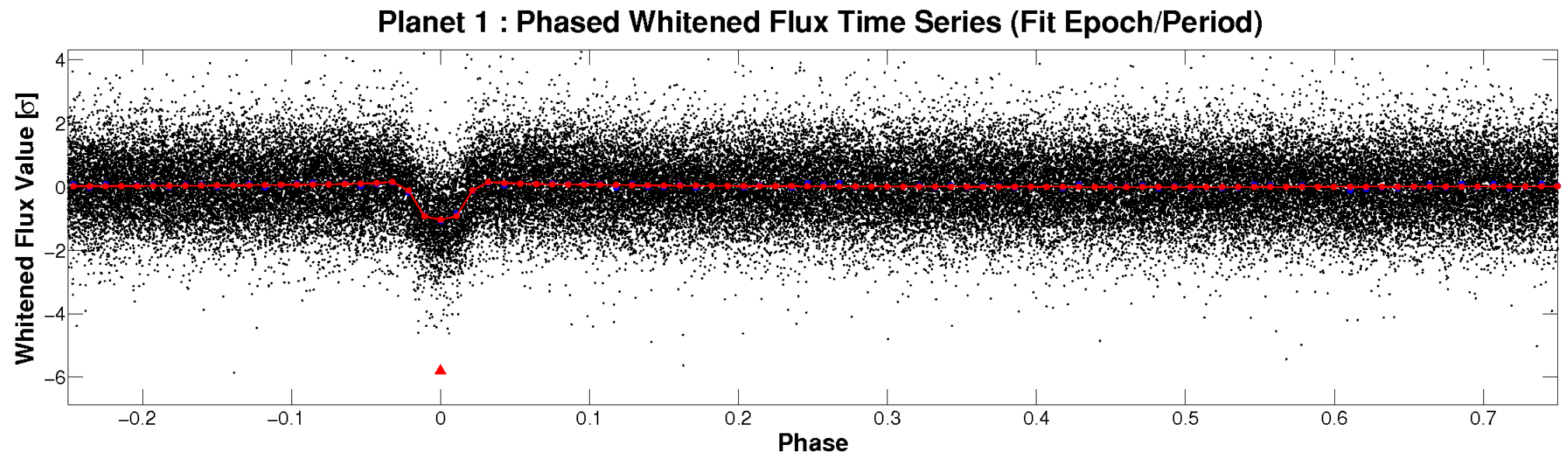
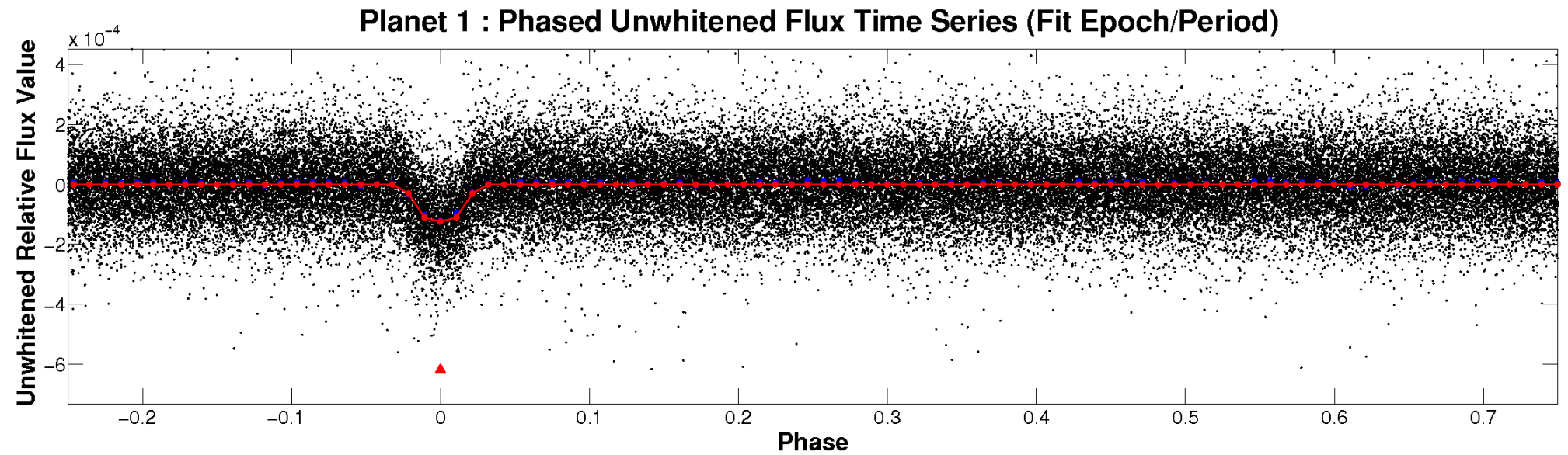


ALT Odd/Even

TCE 007269493-01

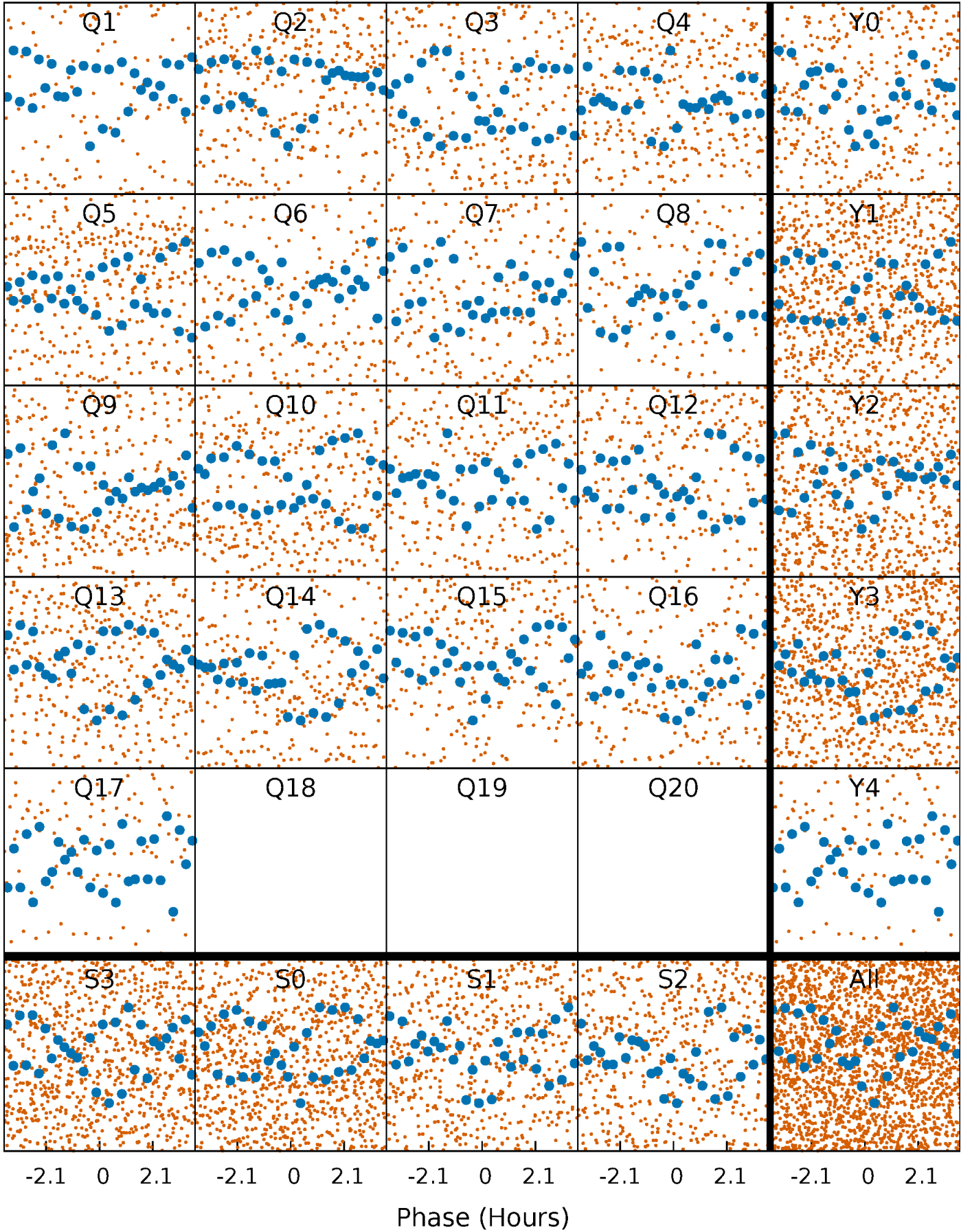


Non-Whitened Vs. Whitened Light Curve



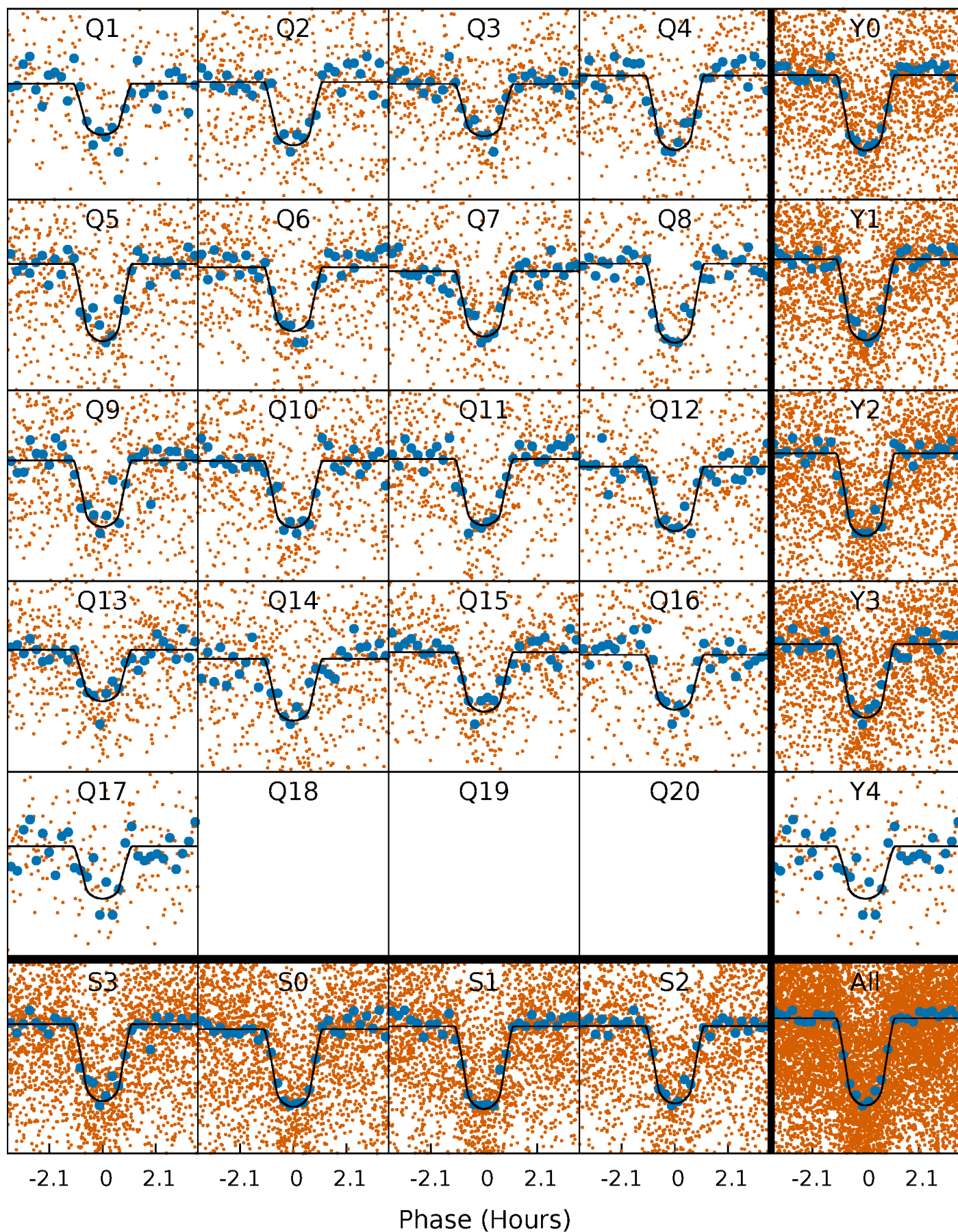
PDC Quarter-Phased Transit Curves

TCE 007269493-01 P= 1.907813 Days $T_0=131.637740$ (BKJD)



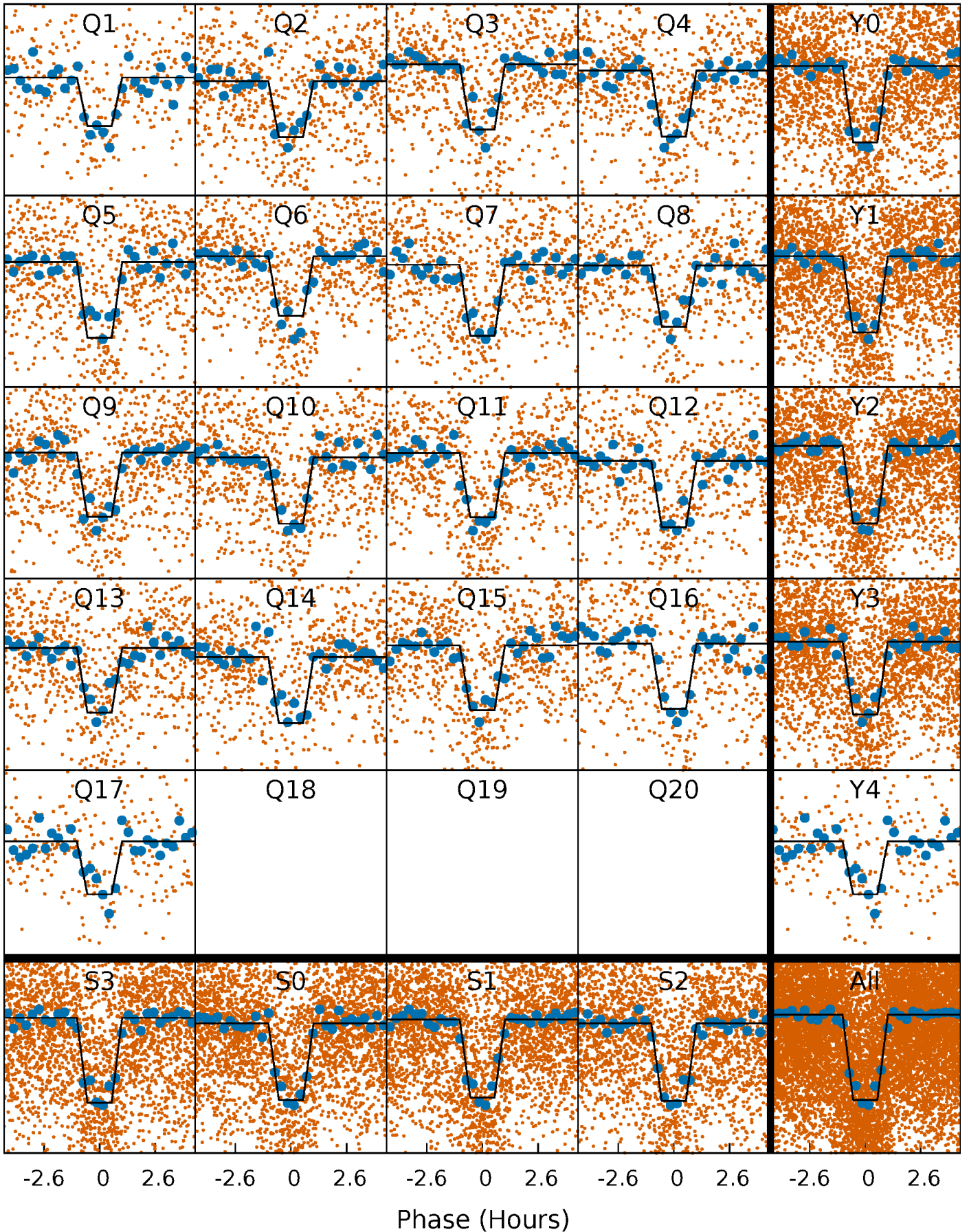
DV Quarter-Phased Transit Curves

TCE 007269493-01 P= 1.907813 Days $T_0=131.637740$ (BKJD)



Alt. Detrend Quarter-Phased Transit Curves

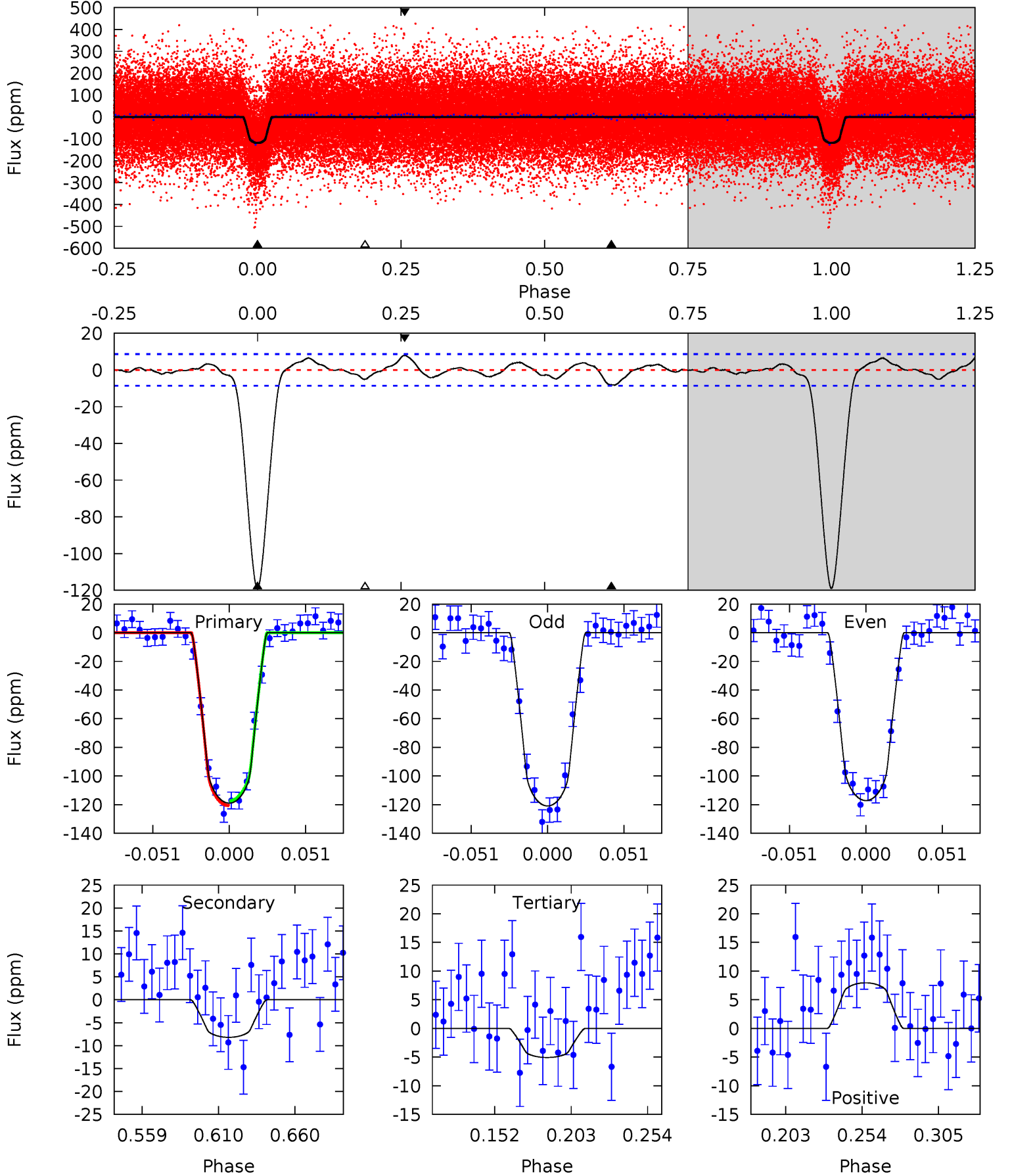
TCE 007269493-01 P= 1.907803 Days $T_0=131.640706$ (BKJD)



DV Model-Shift Uniqueness Test

007269493-01, P = 1.907813 Days, E = 129.729927 Days

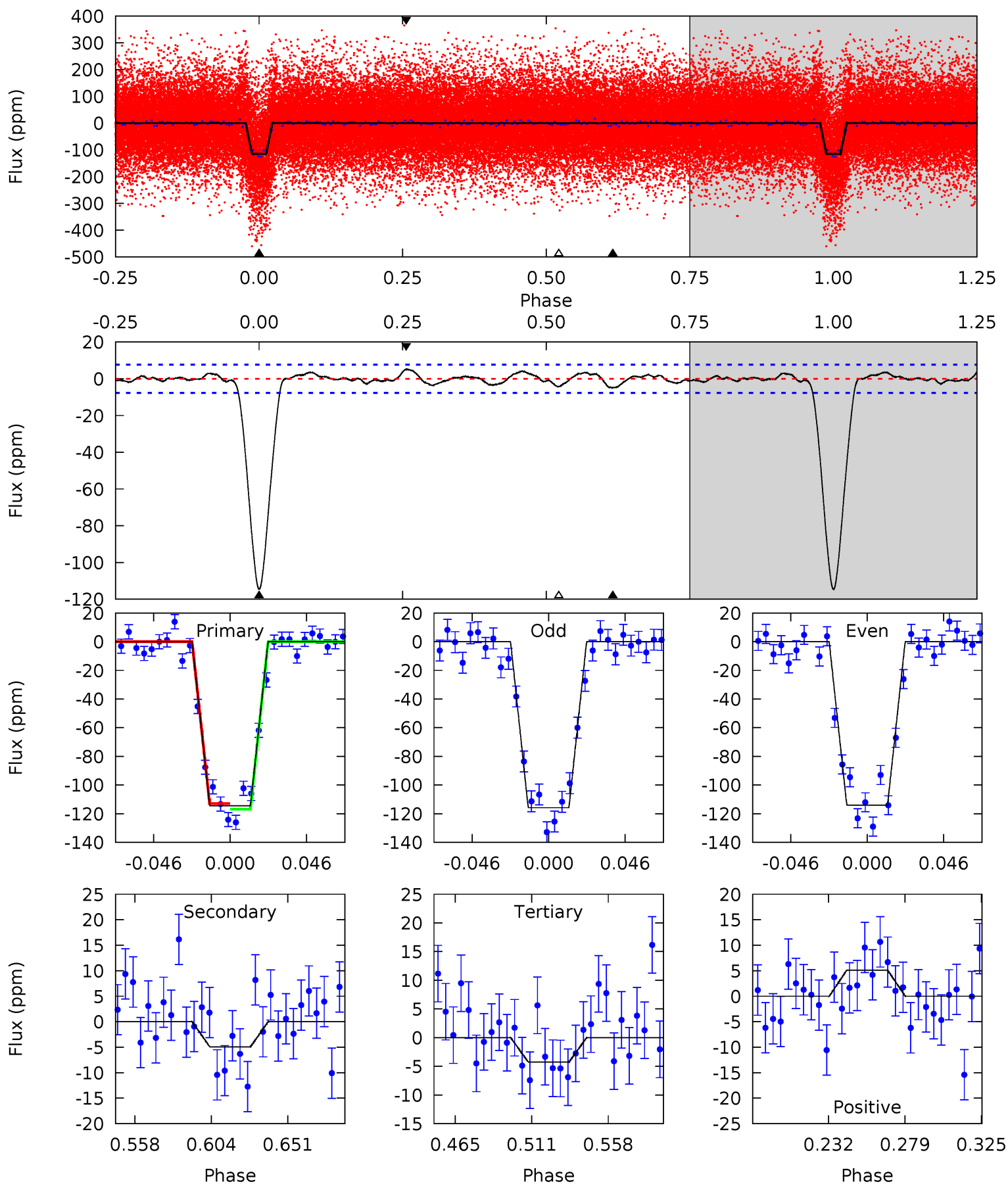
Pri	Sec	Ter	Pos	FA ₁	FA ₂	F _{Red}	Pri-Ter	Pri-Pos	Sec-Ter	Sec-Pos	Odd-Evn	DMM	Shape	TAT
65.0	4.48	2.77	4.35	4.70	1.95	1.45	62.2	60.7	1.71	0.13	1.03	0.99	0.06	0.90



Alt Model-Shift Uniqueness Test

007269493-01, P = 1.907803 Days, E = 129.732903 Days

Pri	Sec	Ter	Pos	FA ₁	FA ₂	F _{Red}	Pri-Ter	Pri-Pos	Sec-Ter	Sec-Pos	Odd-Evn	DMM	Shape	TAT
70.3	3.02	2.60	3.14	4.72	1.99	1.16	67.7	67.1	0.41	-0.12	0.56	1.00	0.04	1.18



Stellar Parameters For KIC 007269493

	$T_{\text{eff}}(K)$	$\log(g)$	[Fe/H]	$R (R_{\odot})$	$M(M_{\odot})$	$p_{\star} (g \cdot \text{cm}^{-3})$
	5435^{+97}_{-119}	$4.578^{+0.010}_{-0.095}$	$0.070^{+0.150}_{-0.150}$	$0.824^{+0.086}_{-0.033}$	$0.937^{+0.039}_{-0.072}$	$2.358^{+0.180}_{-0.635}$
	+2%/-2%	+0%/-2%	+214%/-214%	+10%/-4%	+4%/-8%	+8%/-27%
Source	SPE59	SPE59	SPE59	DSEP		

KIC = Kepler Input Catalog; PHO = Photometry; SPE = Spectroscopy; AST = Asteroseismology
 TRA = Transits; DESP = Dartmouth Models; MULT = Multiple Models

Secondary Eclipse Parameters for KIC 007269493-01 / KOI 1961.01

Detrend	Depth (ppm)	$R_p (R_{\oplus})$	$T_{max} (K)$	$T_{obs} (K)$	A_{obs}
DV	-8 ± 2	$1.12^{+0.22}_{-0.22}$	1800^{+55}_{-51}	3156^{+252}_{-216}	$2.986^{+1.870}_{-1.028}$
Alt.	-5 ± 2	$0.99^{+0.22}_{-0.20}$	1798^{+53}_{-49}	3008^{+283}_{-250}	$2.230^{+1.673}_{-0.916}$

T_{max} = Theoretical Maximum Planetary Temperature

T_{obs} = Observed Planetary Temperature (Assuming $A=0.3$)

A_{obs} = Observed Albedo (Assuming $T=0$)

If a secondary eclipse is present, the system is likely an EB if $T_{obs} \gg T_{max}$ AND $A_{obs} \gg 1.0$

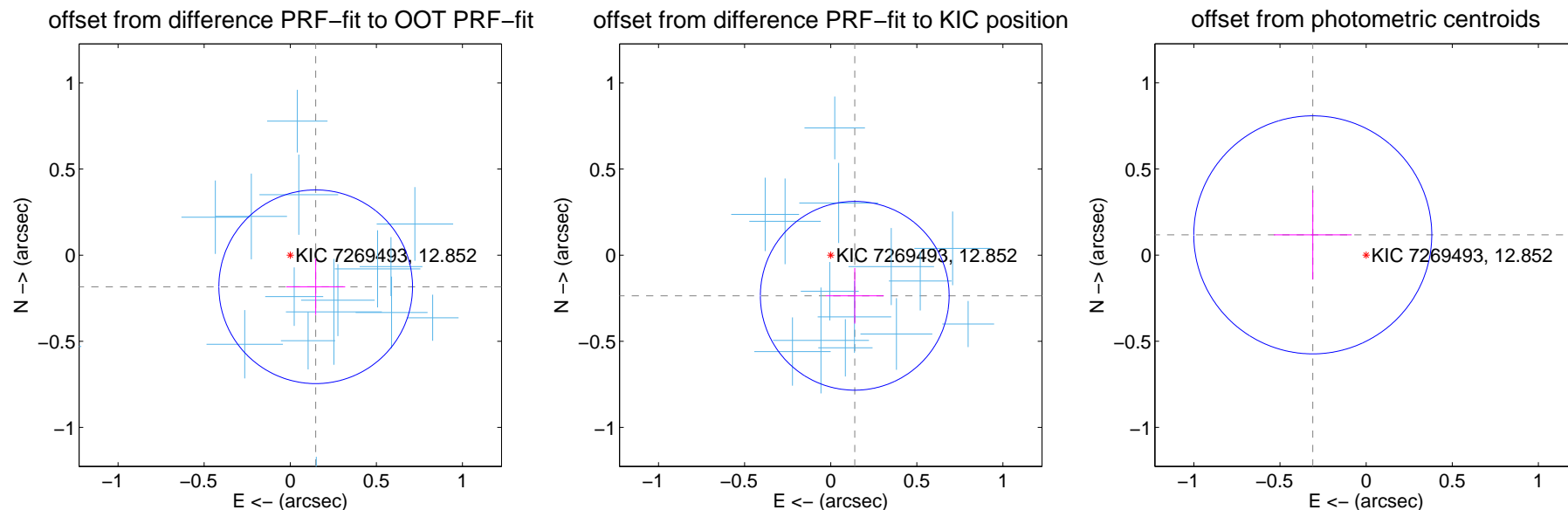
DV Centroid Data

Supplemental centroid analysis for 007269493-01. Kepler magnitude: 12.85. Transit SNR 45.51

There are 17 quarters with good PRF difference image offsets

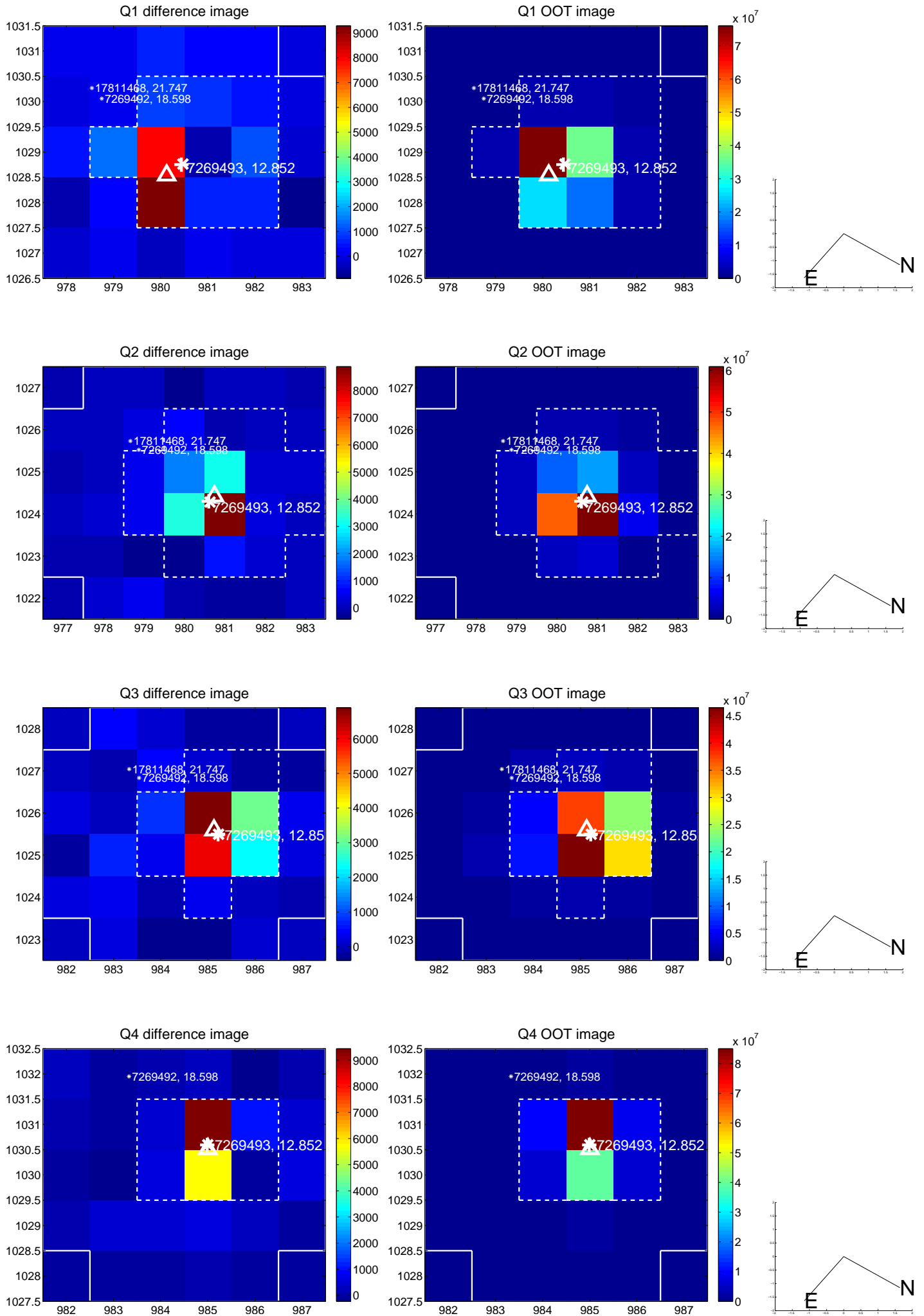
The direct PRF centroid is offset from the target star catalog position by about 0.13 arcsec

	Distance in arcsec	Distance / σ	Δ RA	Δ Dec
PRF-fit source offset from OOT	0.236 ± 0.187	1.26	-0.148 ± 0.171	-0.184 ± 0.164
PRF-fit source offset from KIC position	0.274 ± 0.183	1.50	-0.140 ± 0.168	-0.236 ± 0.161
photometric centroid source offset	0.33 ± 0.23	1.44	0.31 ± 0.23	0.12 ± 0.26

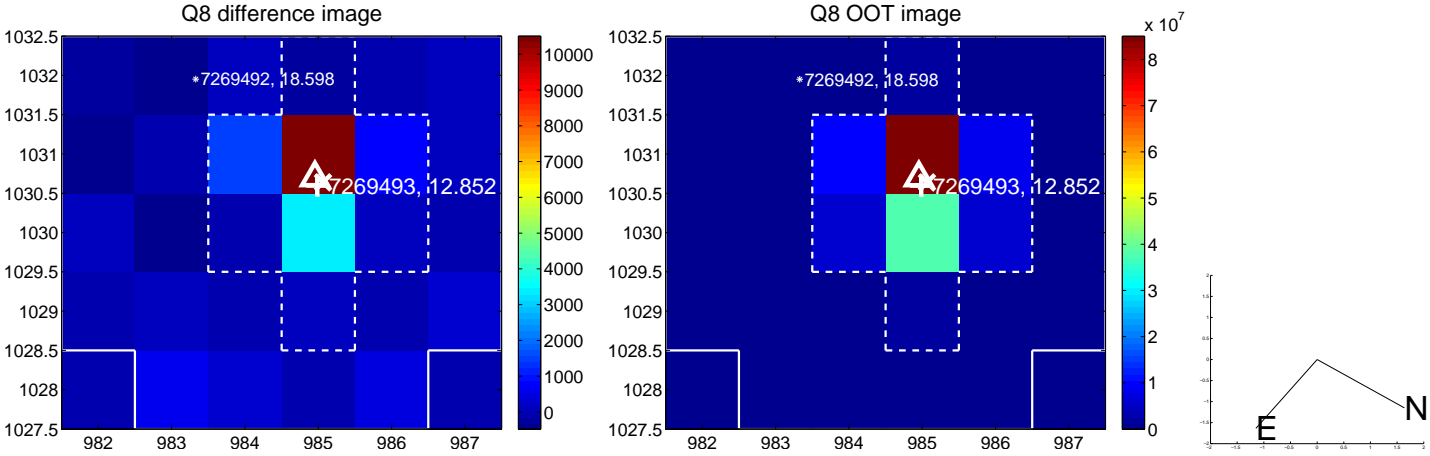
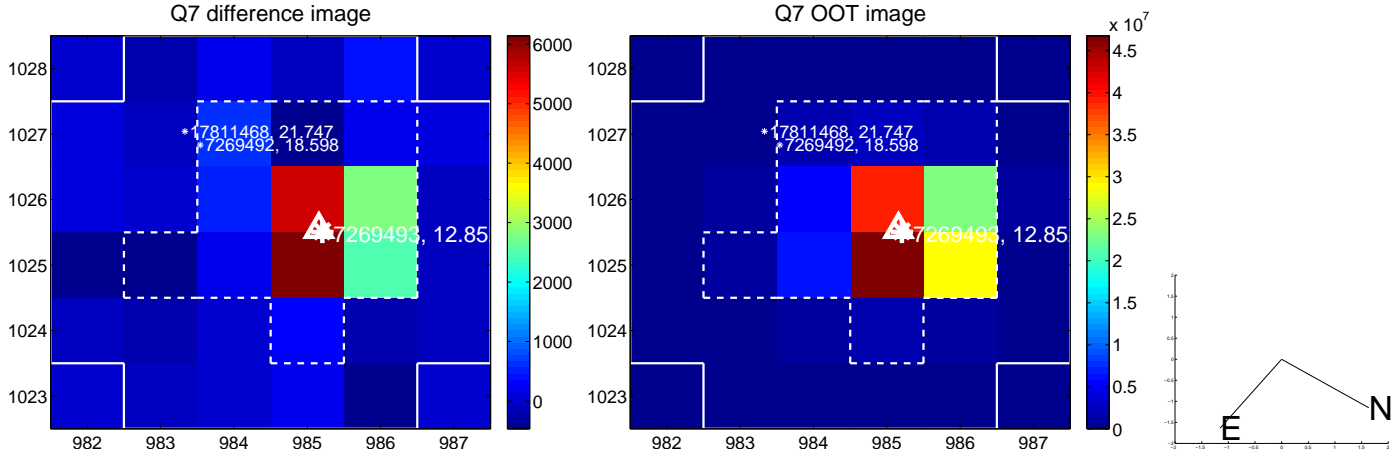
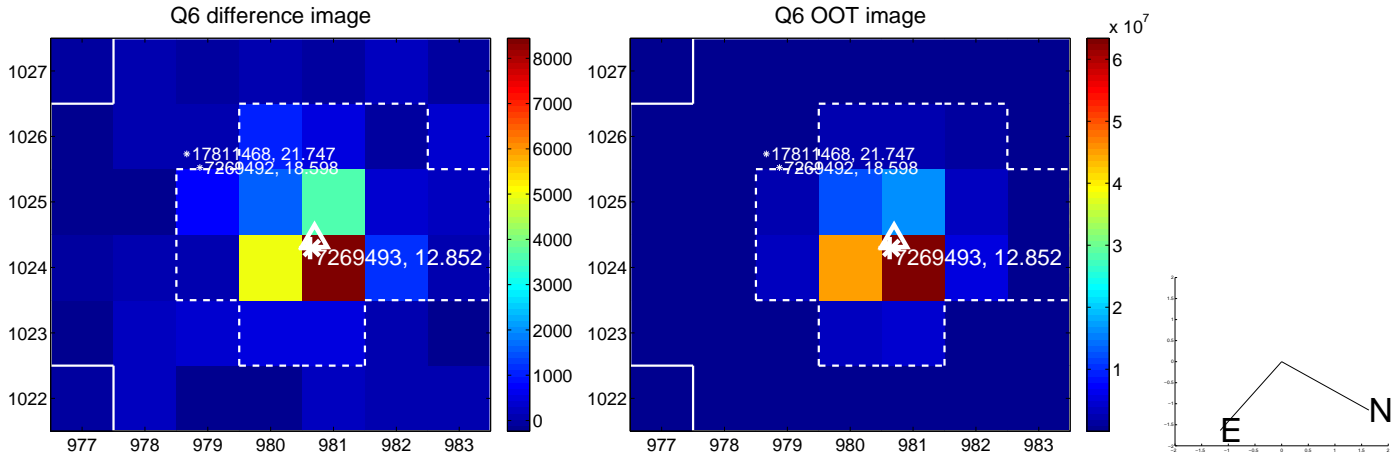
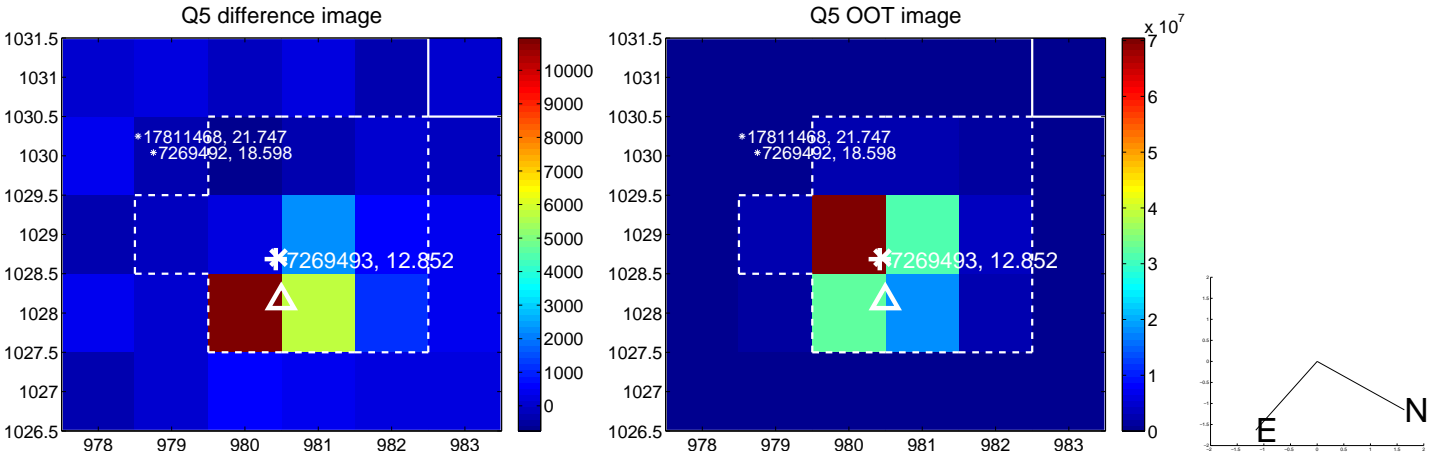


Centroid source offsets from the target star reconstructed from PRF and photometric centroids. **Sky blue crosses:** good quarterly centroid offsets; **Vermillion crosses:** bad quarterly centroid offsets; magenta cross: average over quarters. Length of the crosses: one- σ uncertainty. Blue circle: three- σ . Red *: target star. Blue *: Other stars. Text next to a star gives its KIC ID and kepmag. KIC IDs > 15,000,000 are from the UKIRT catalog.

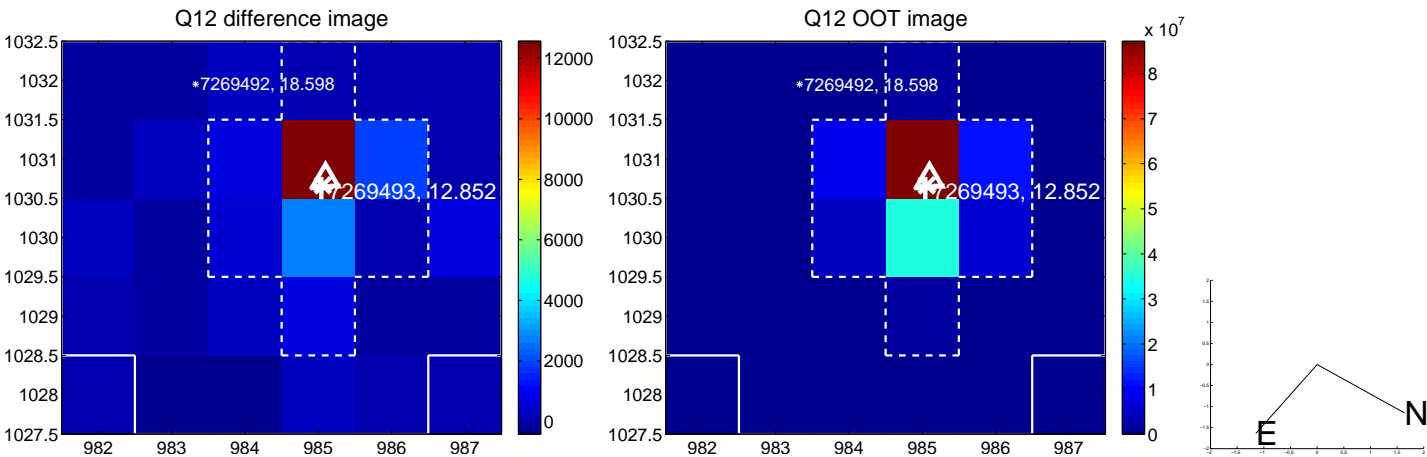
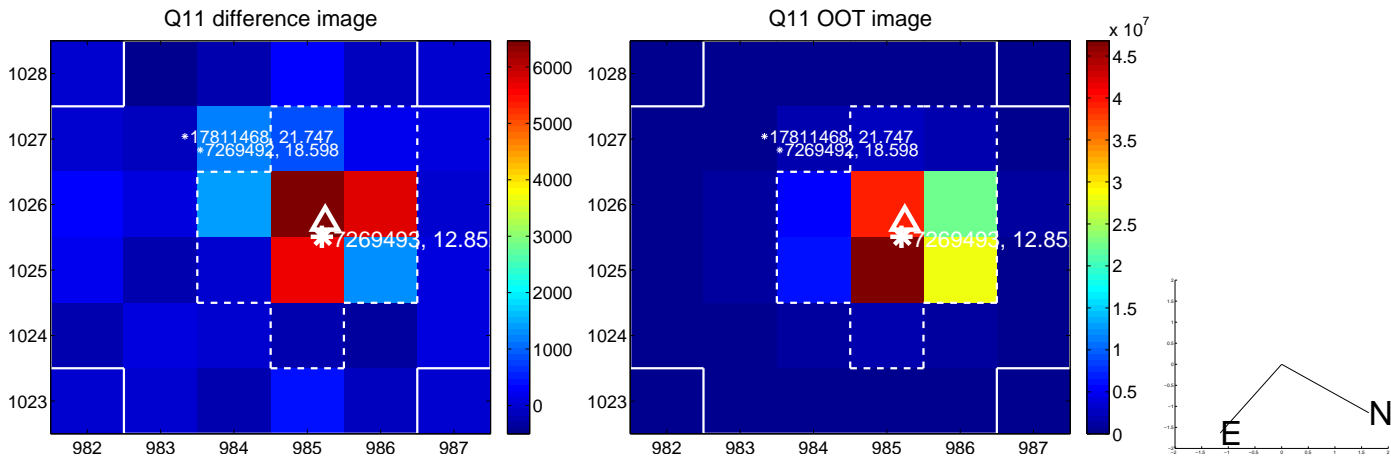
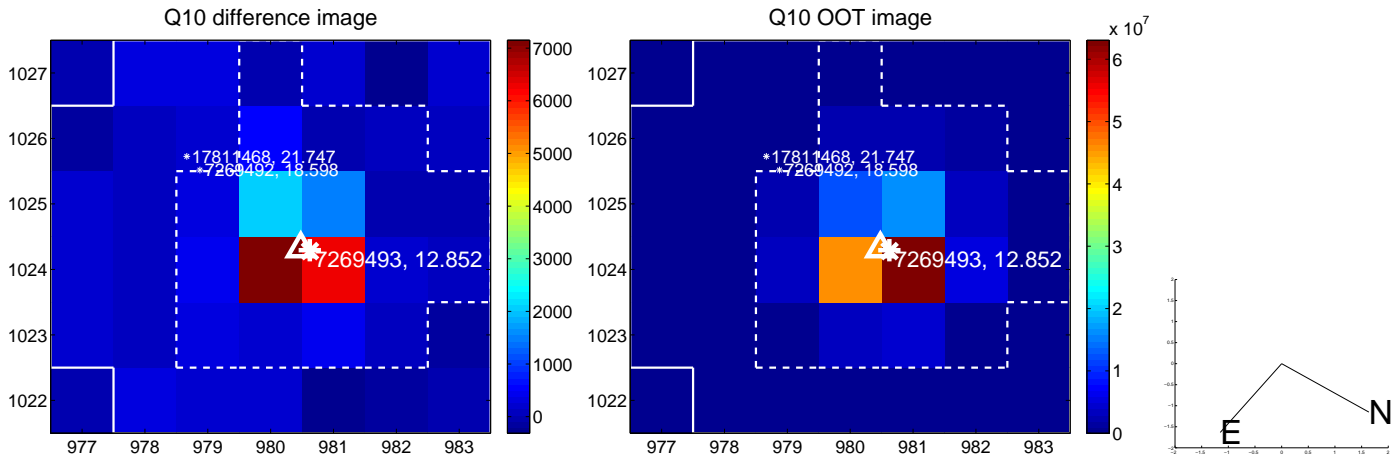
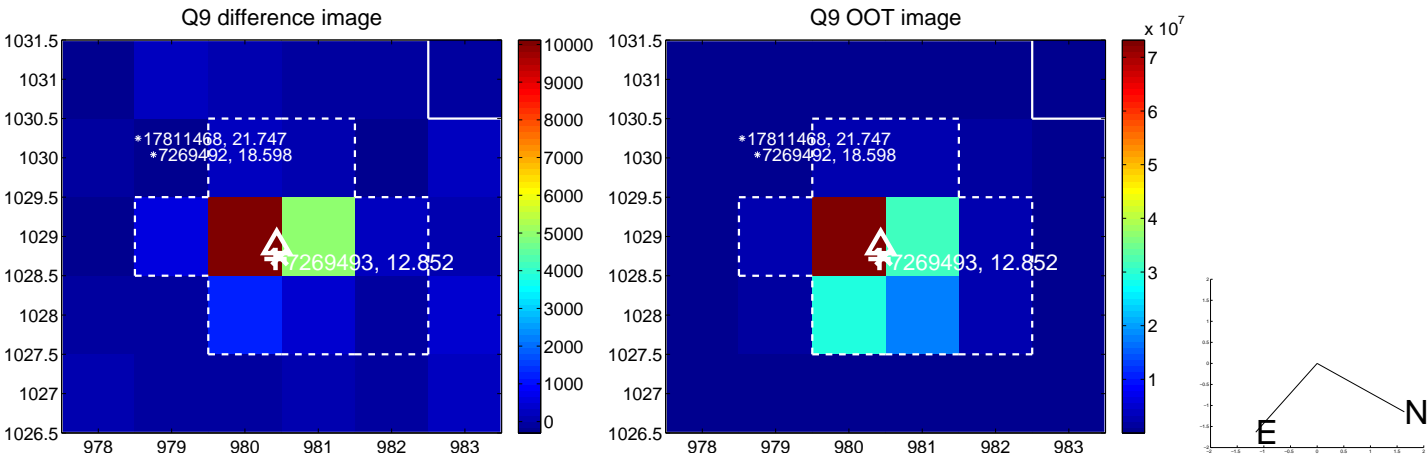
white \times : KIC target position; $+$: OOT centroid; \triangle : difference centroid. red \times : large negative pixel value.



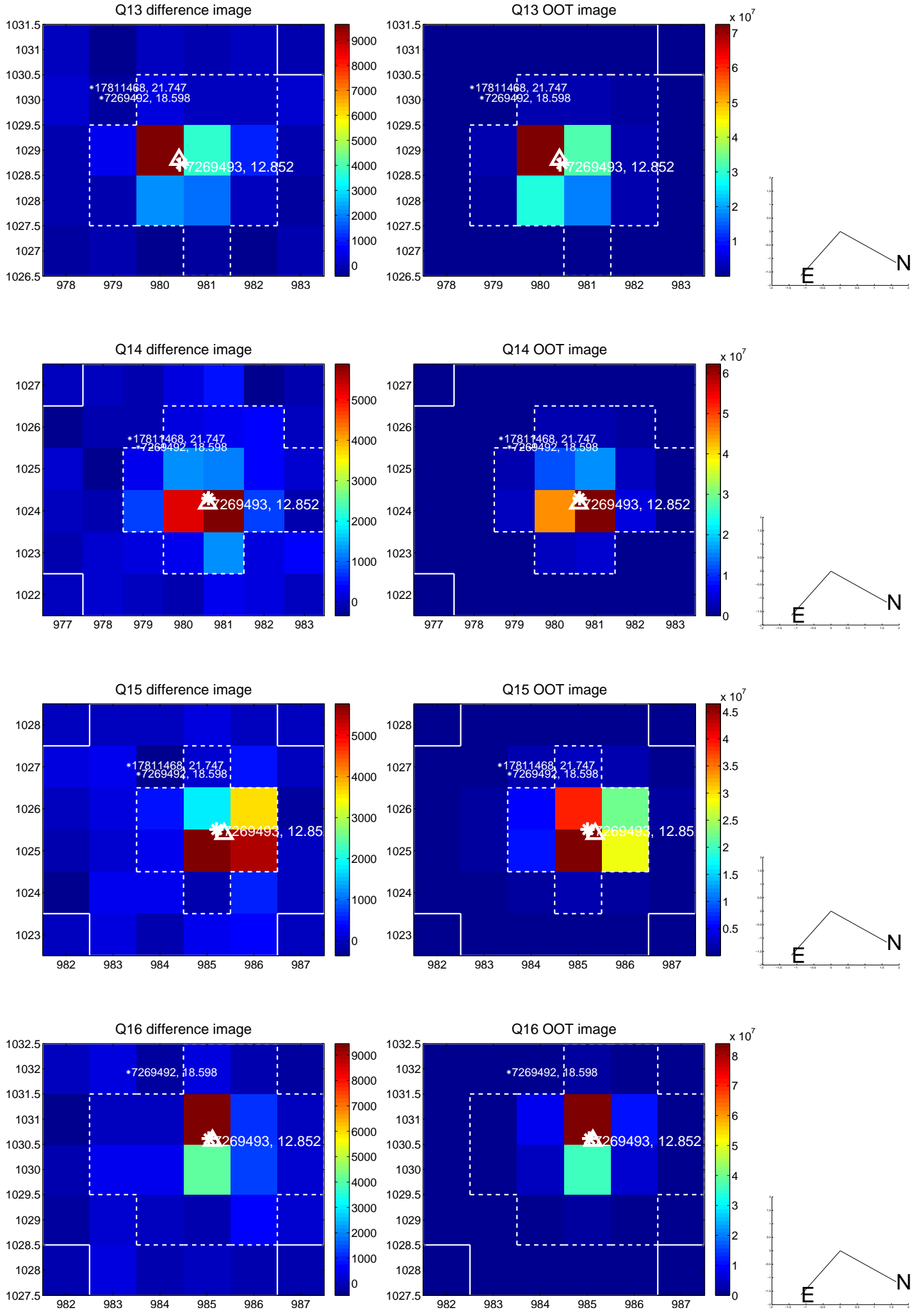
white \times : KIC target position; +: OOT centroid; \triangle : difference centroid. red \times : large negative pixel value.



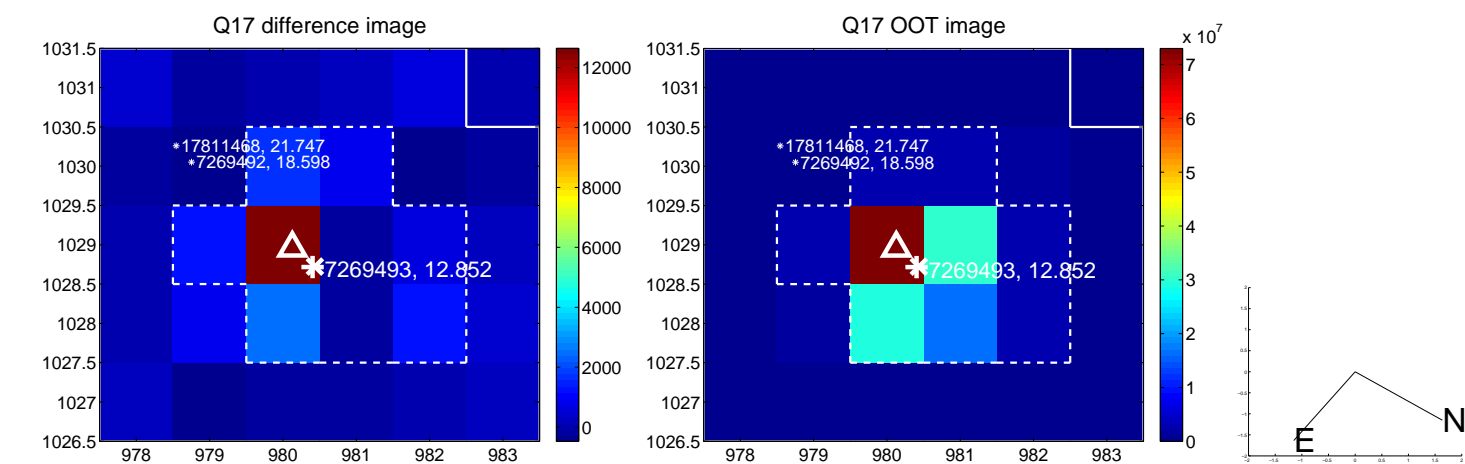
white \times : KIC target position; +: OOT centroid; \triangle : difference centroid. red \times : large negative pixel value.



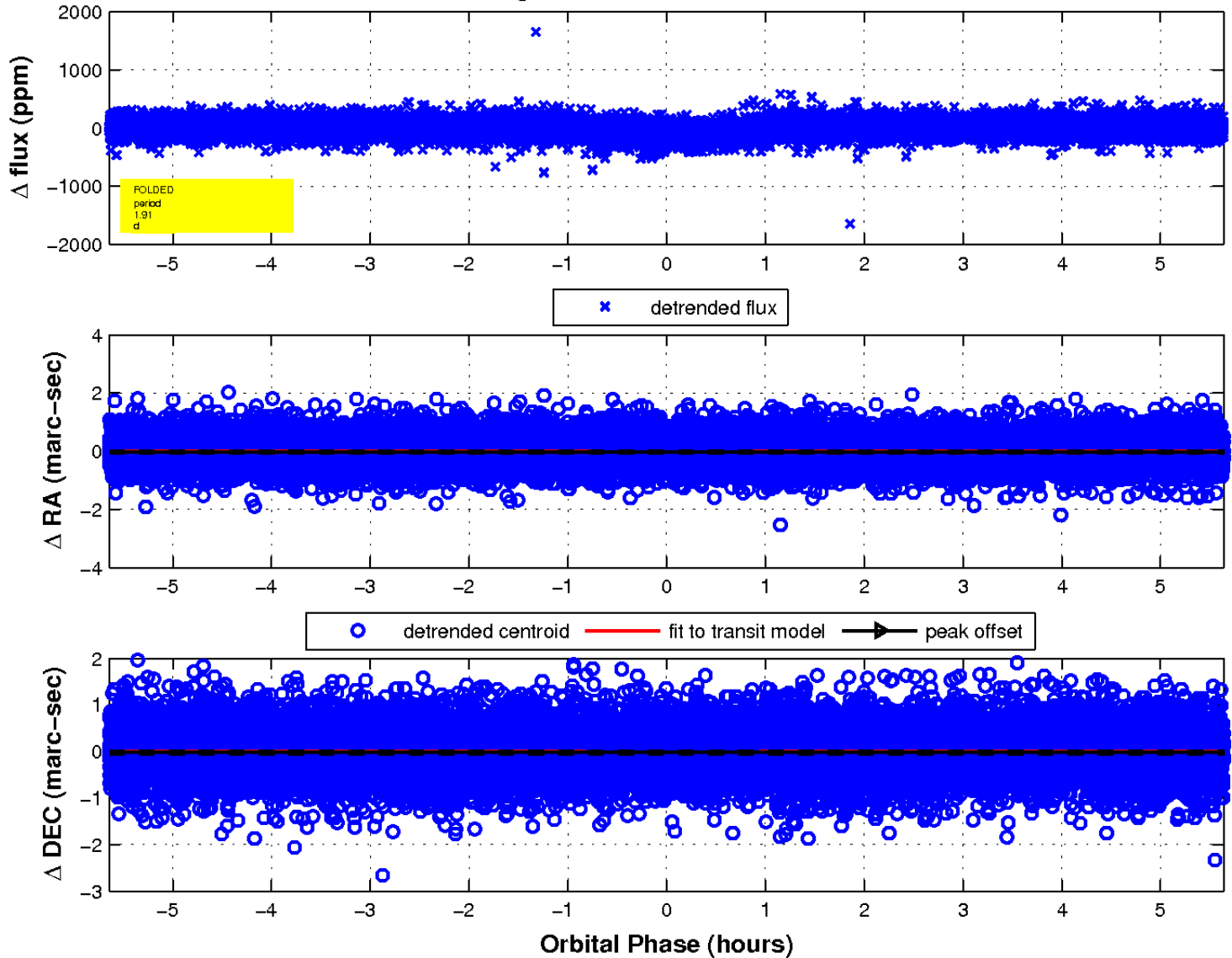
white \times : KIC target position; $+$: OOT centroid; \triangle : difference centroid. red \times : large negative pixel value.



white \times : KIC target position; $+$: OOT centroid; Δ : difference centroid. red \times : large negative pixel value.



fluxWeightedCentroids, Planet 1 of 1



UKIRT Image

Declination

