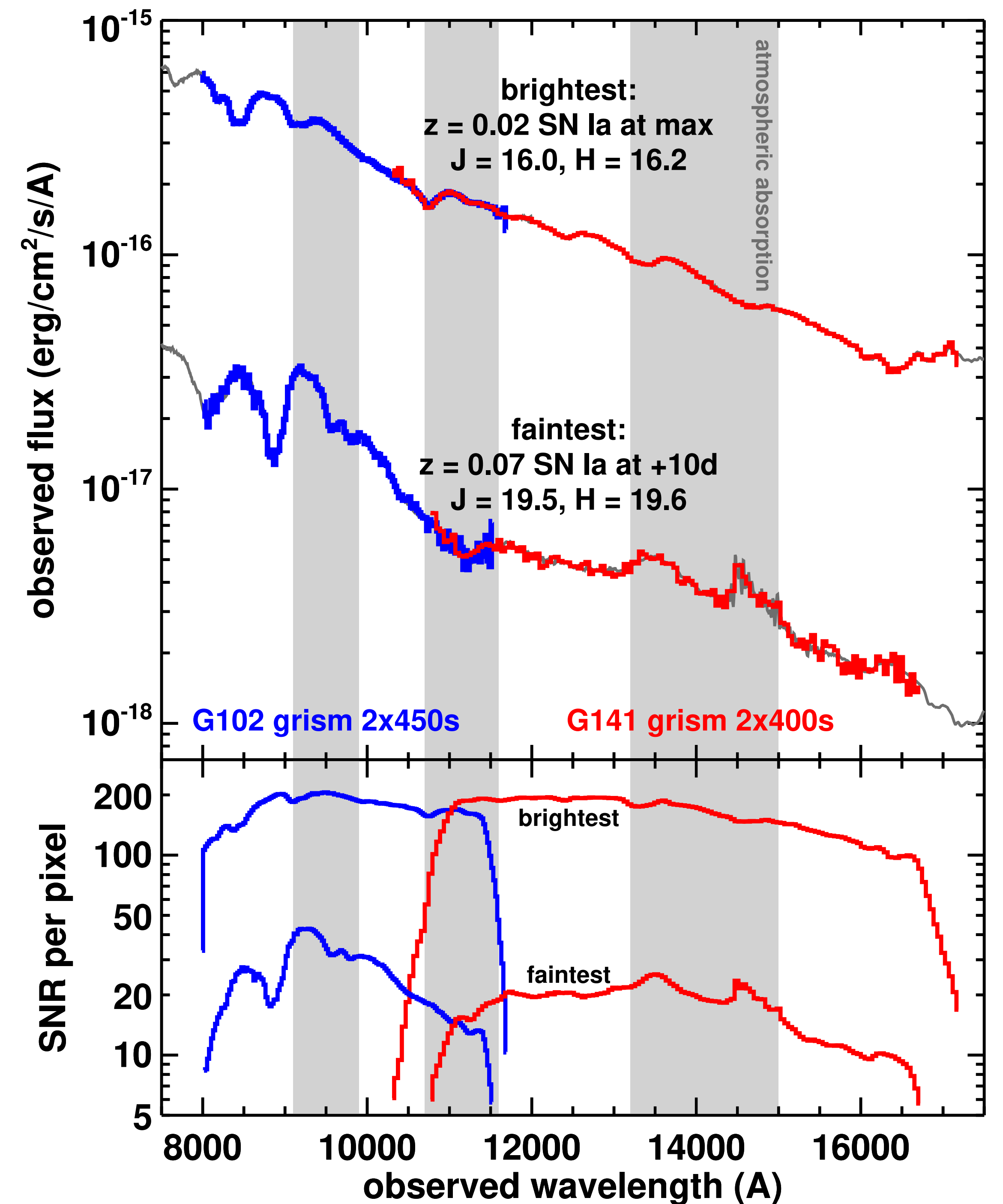
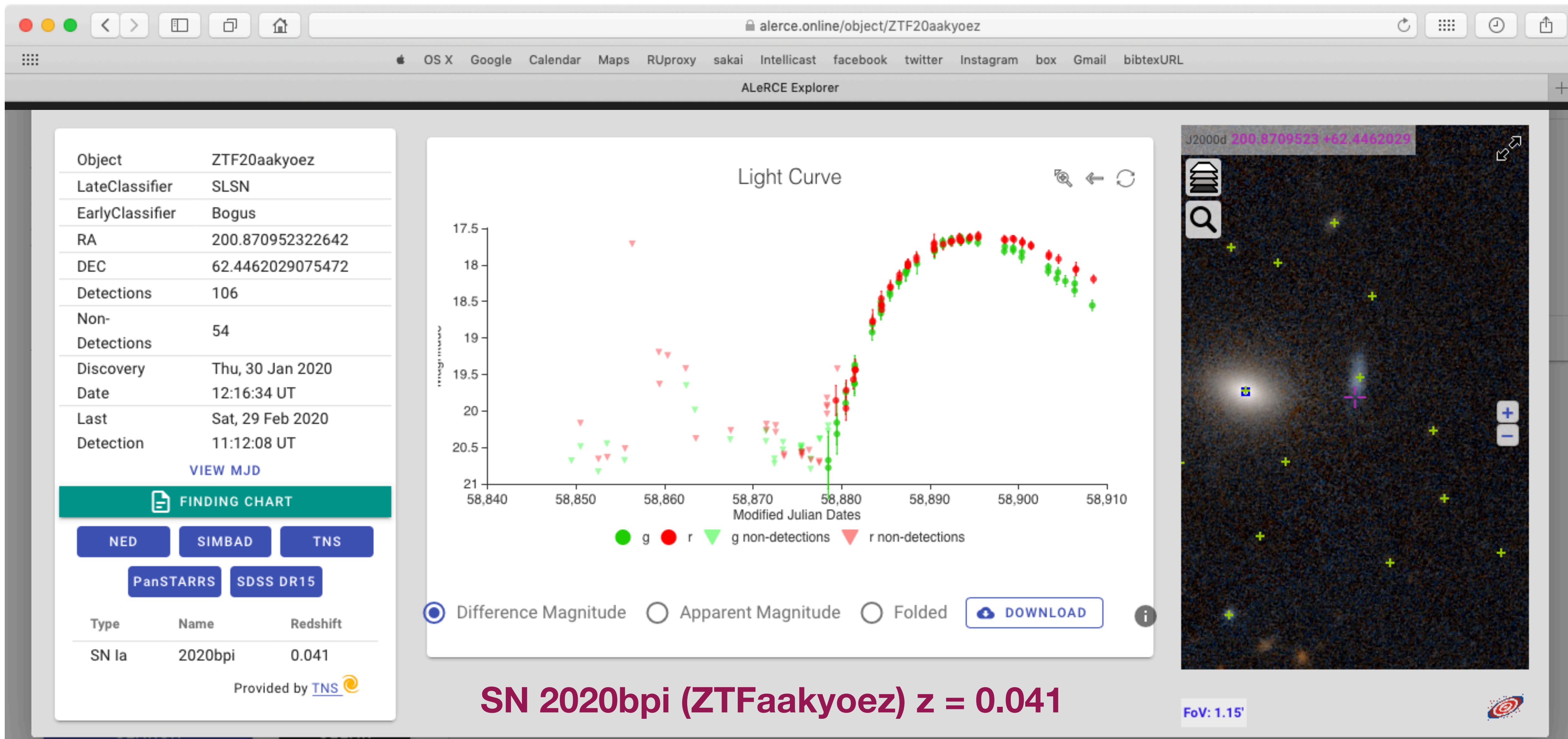




- 24 Hubble-flow SN Ia ($0.02 < z < 0.07$) with HST WFC3/IR in Cycles 27 and 28
- F098M, F105W, F125W, F140W, F160W photometry + grism spectroscopy (above the atmosphere!) 1 orbit, 2 epochs
- 3 key science goals:
 - ★ rest-frame NIR SEDs for Roman ST
 - ★ 2.7% NIR SN Ia H_0 measurement
 - ★ w/RAISINs, WFC3/IR-only Hubble diagram to $z = 0.6$
- ~2 objects/month starting Feb 2020





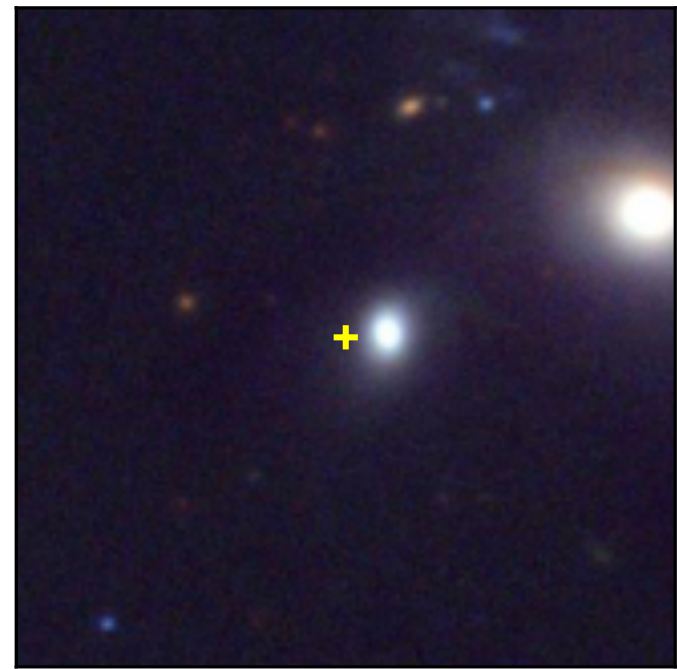
SN 2020bpi (ZTFaakyoez) $z = 0.041$



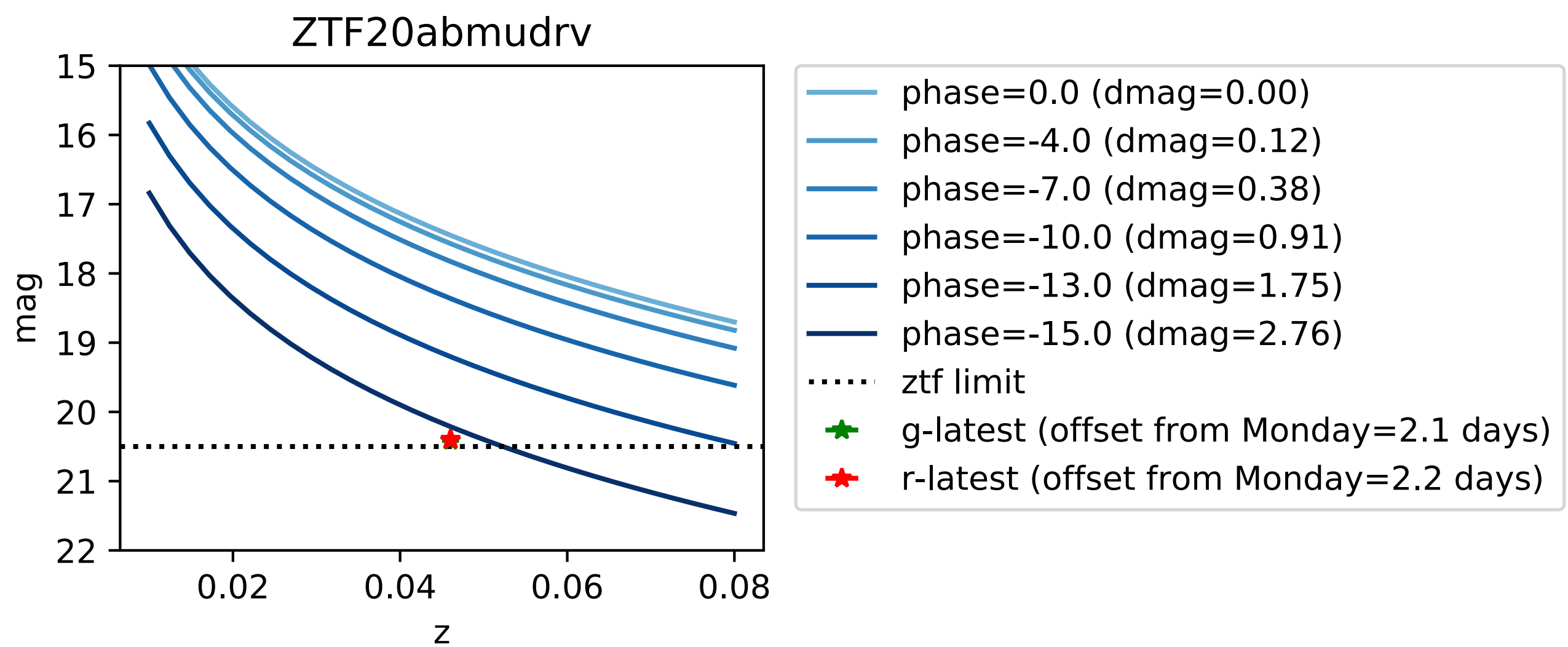
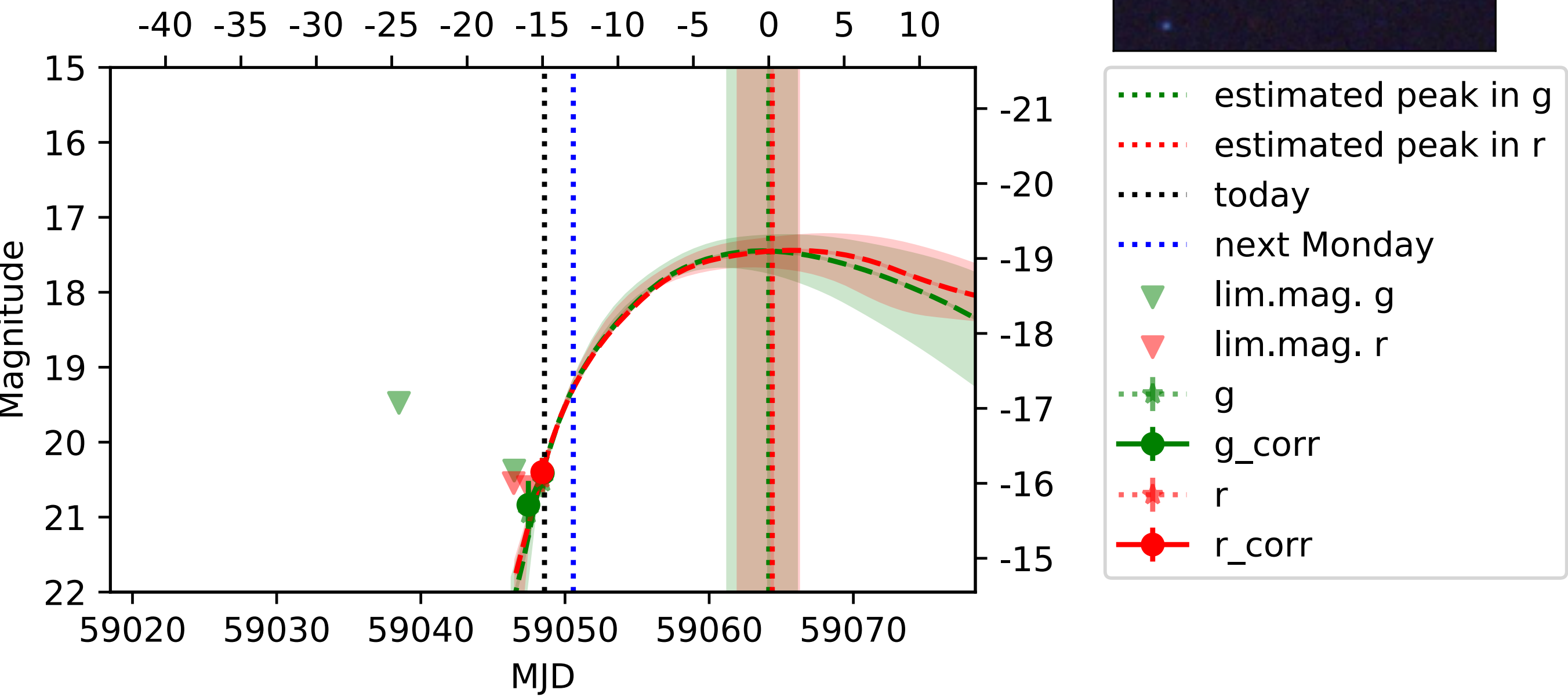
building on ZTF, ATLAS, PS, ASASSN, ...
and brokers like ALeRCE and Lasair

with Rutgers
postdoc Mi Dai

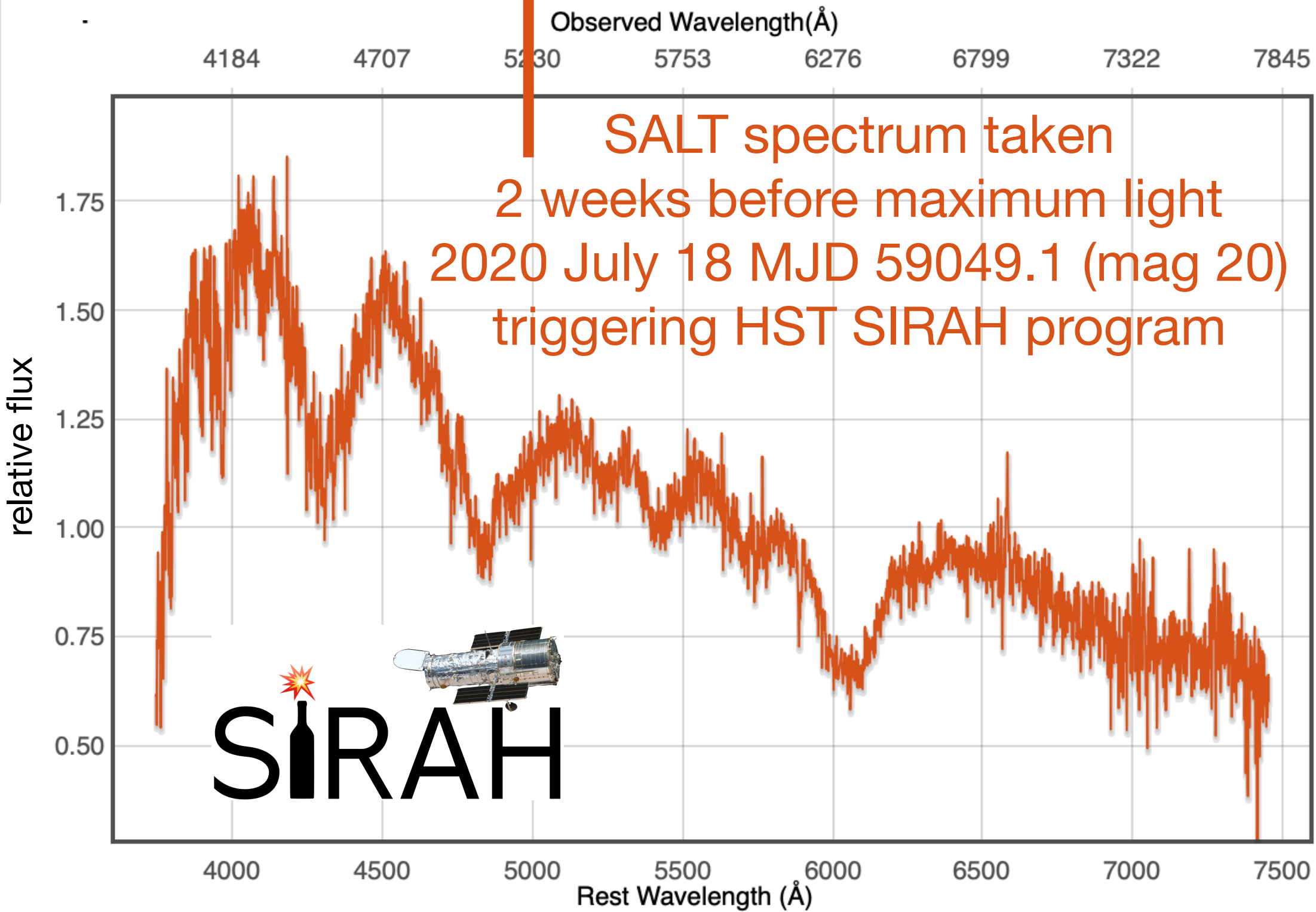
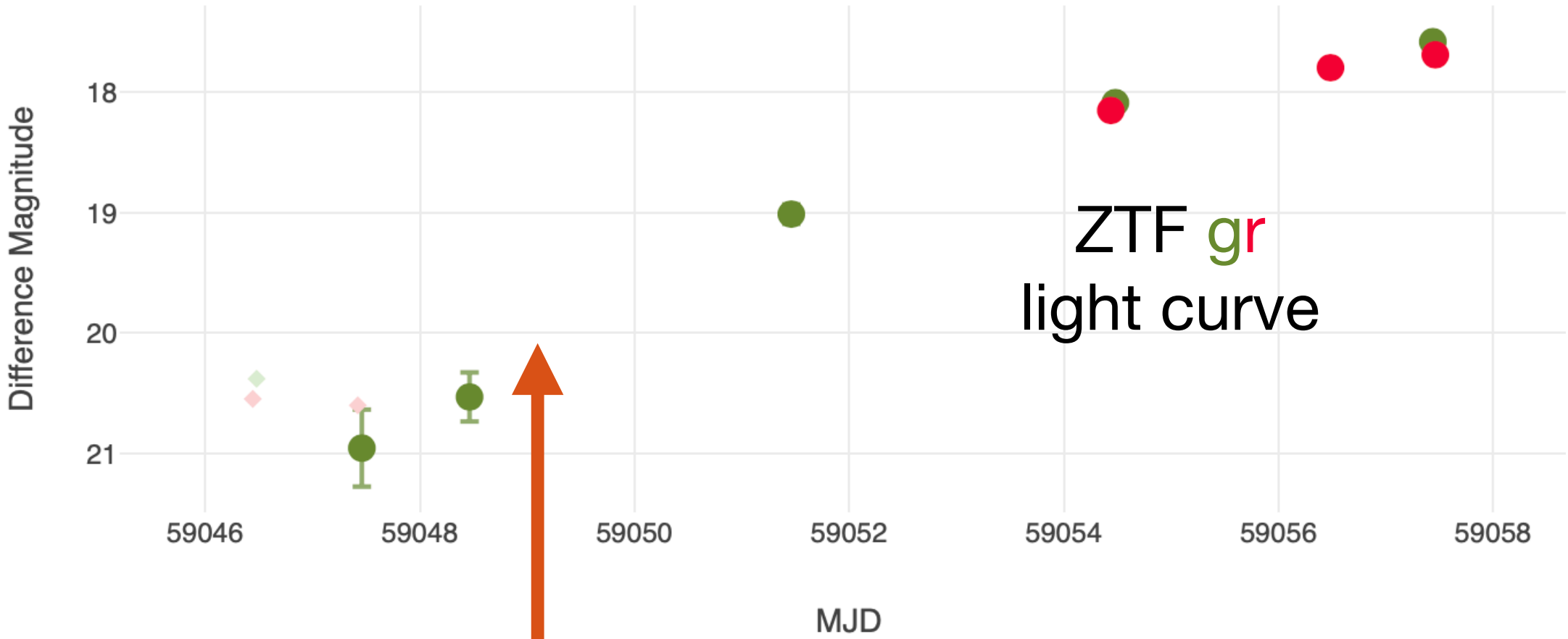
ZTF20abmudrv: $z=0.0460 \pm 0.0010$ (ned)
ra=01:13:12.002, dec=+02:17:01.91, mwebv=0.032

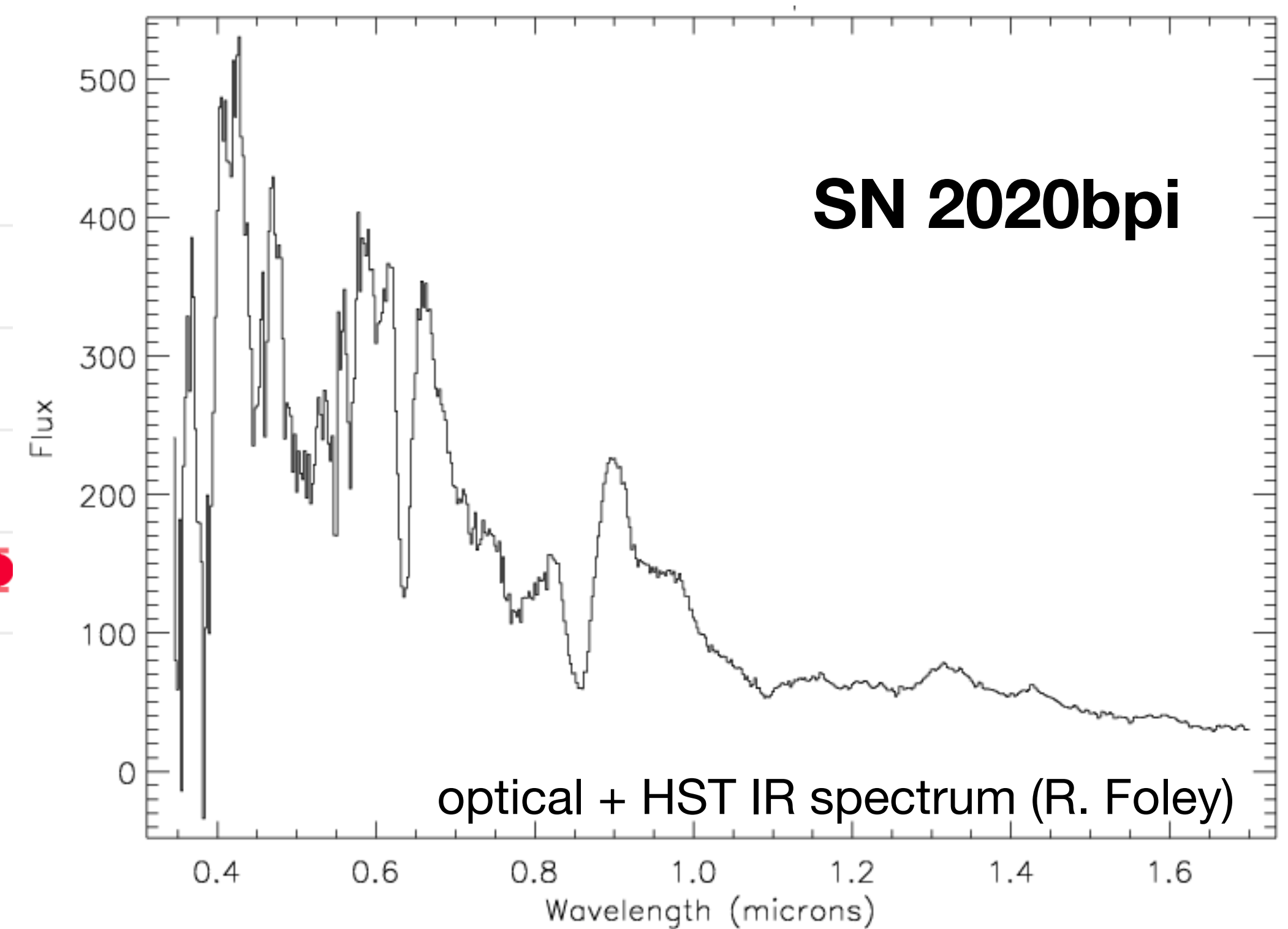
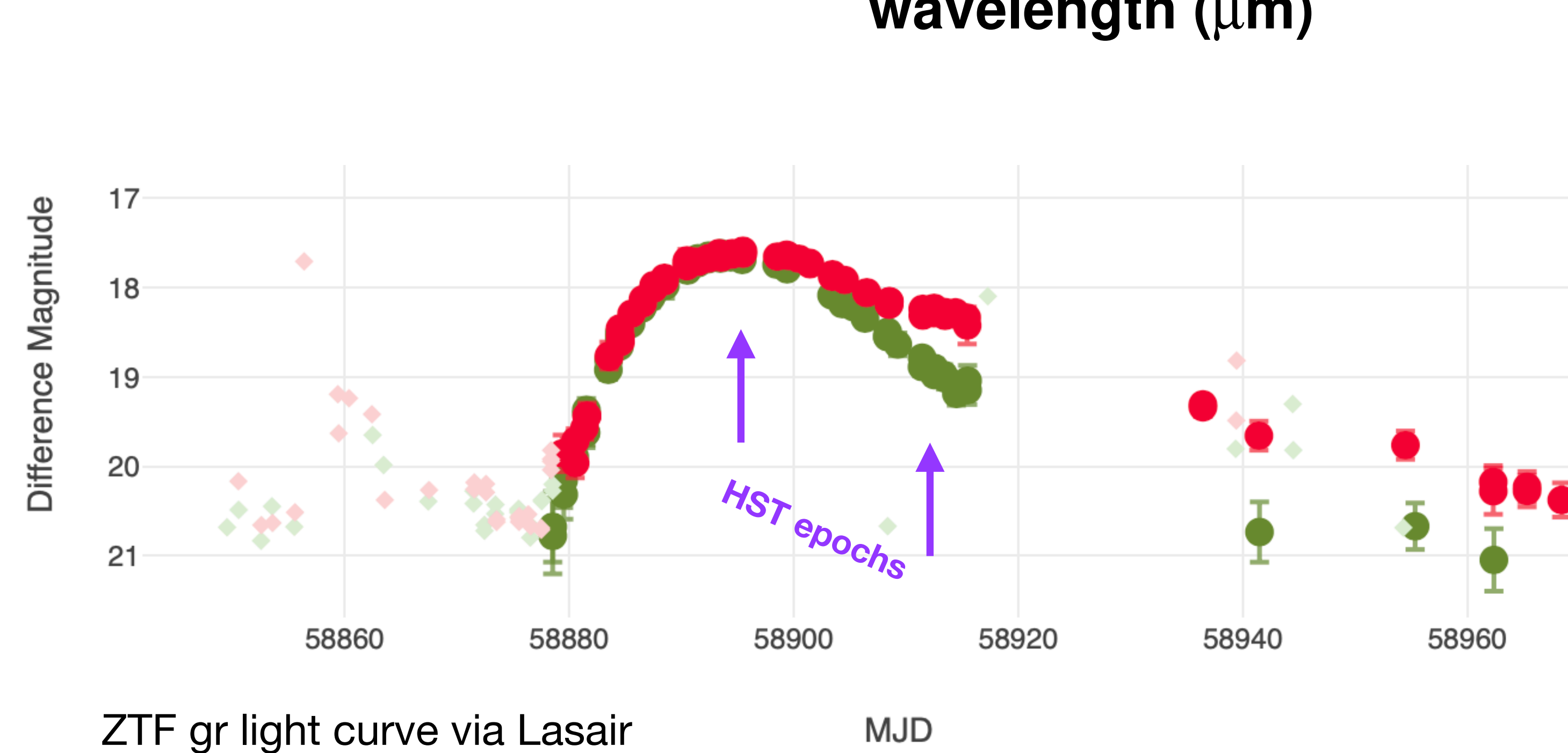
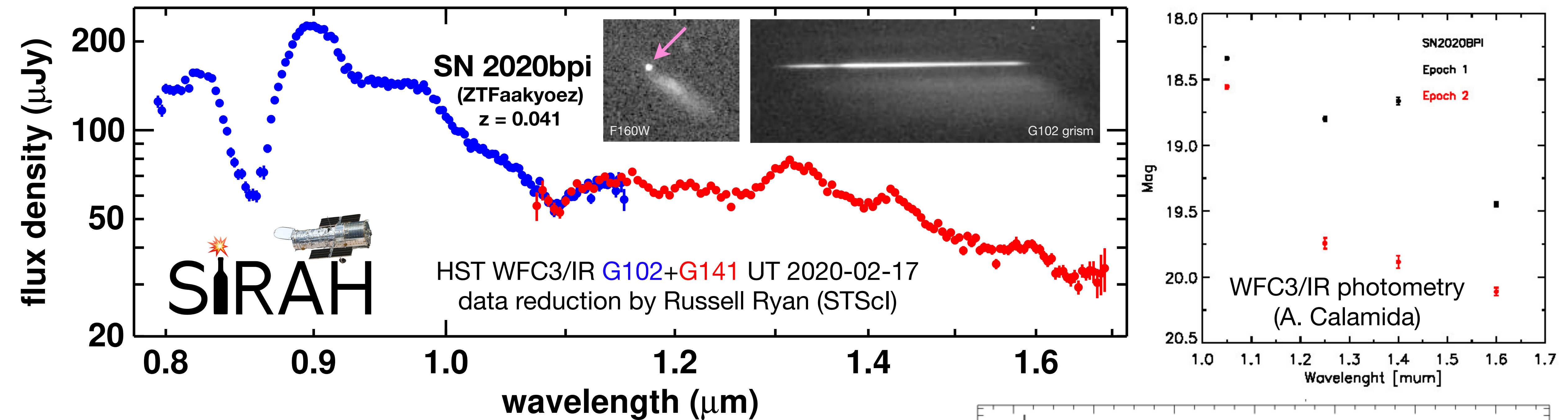


<https://lasair.roe.ac.uk/object/ZTF20abmudrv>
<https://alerce.online/object/ZTF20abmudrv>



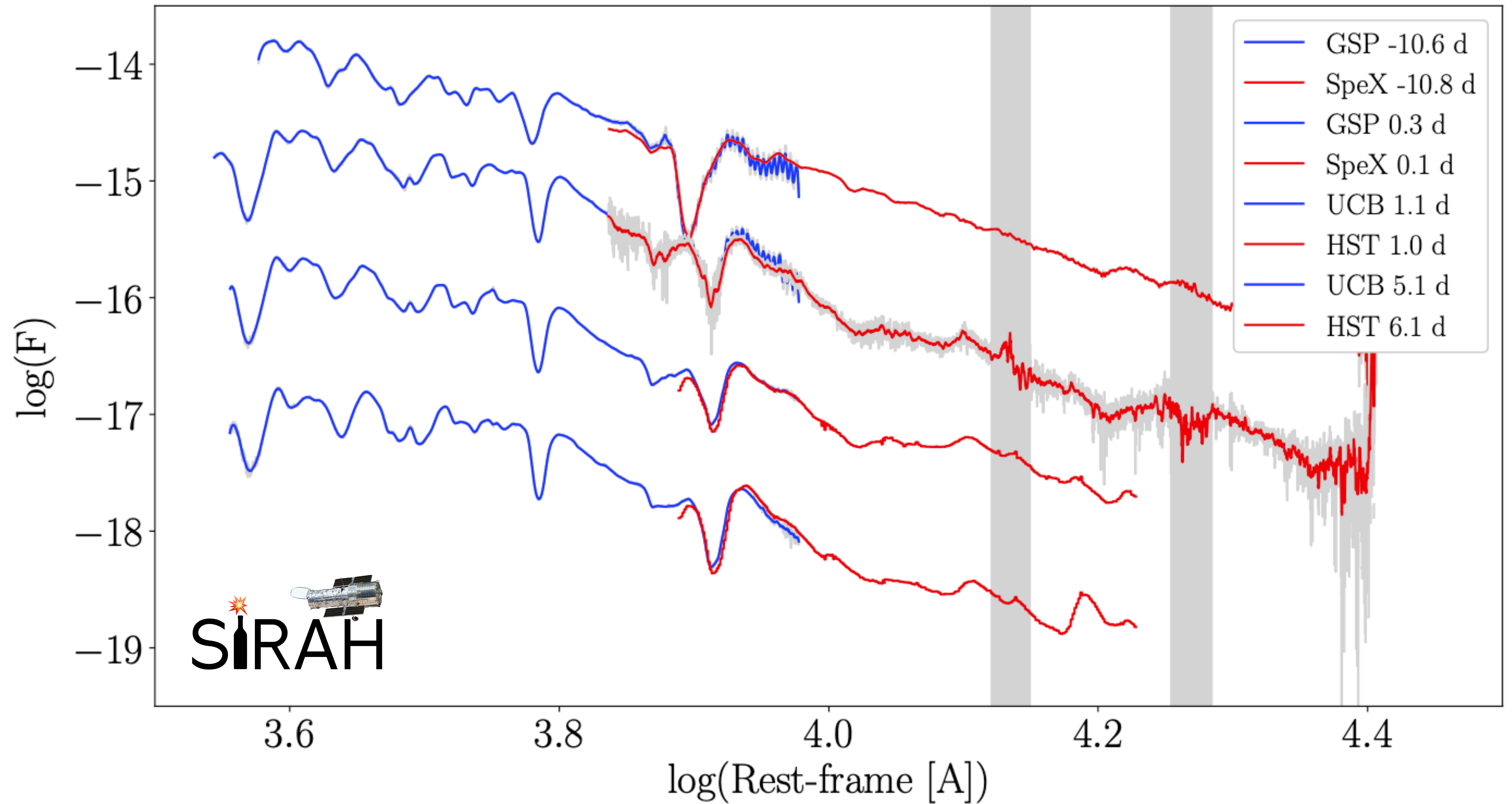
Object ZTF20abmudrv = SN 2020pst “Merlot”





SN 2020jgl $z = 0.007$

Galbany et al. (in prep.)



Supernova	SIRAH name	RA	DEC	redshift	peak date (est.)
SN 2020bpi	Champagne	13:23:29.024	+62:26:46.28	0.041	2020-02-14
SN 2020dhj	Sangiovese	14:53:30.373	+17:17:20.97	0.044	2020-03-09
SN 2020ees	Zinfandel	13:27:15.176	+32:02:00.74	0.024	2020-03-19
SN 2020fxa	Malvasia	15:34:33.036	+37:32:01.85	0.064	2020-04-19
SN 2020jdo	Medoc	18:15:43.648	+58:12:54.81	0.069	2020-05-16
SN 2020jgl	Xarel·lo	09:28:58.431	-14:48:19.76	0.007	2020-05-22
SN 2020kpx	Pinotage	15:38:10.148	+04:46:50.39	0.023	2020-06-05
SN 2020kyx	Carménère	16:13:45.538	+22:55:14.36	0.032	2020-06-09
SN 2020lil	Shiraz	14:37:59.666	+09:23:18.81	0.031	2020-06-14
SN 2020nta	Bourgogne	16:07:23.346	+13:53:33.44	0.034	2020-07-11
SN 2020oyd	Saumur-Champigny	20:04:29.829	+09:20:00.31	0.077	2020-07-21
SN 2020pst	Merlot	01:13:12.033	+02:17:01.92	0.046	2020-08-01
SN 2020qic	Falanghina	00:15:05.611	+43:20:35.64	0.048	2020-08-08
SN 2020rgz	Tacoronte-Acentejo	18:12:01.057	+51:43:28.55	0.029	2020-08-29
SN 2020rlj	Tempranillo	23:01:09.610	+23:29:13.94	0.040	2020-09-02
SN 2020szz	Pinot Noir	23:09:33.100	+15:39:33.43	0.026	2020-09-26
SN 2020tkp	Fitou	23:58:10.572	+22:46:12.45	0.035	2020-09-30
SN 2020tug	Rkatsiteli	23:59:27.888	+17:51:54.74	0.05	2020-10-03
SN 2020uxz		01:24:06.885	+12:55:17.33	0.008	2020-10-16

lots of reconnaissance & follow-up from
LCOGT, Liverpool, SALT, Lick, Gemini, GTC, UKIRT, IRTF, NOT, Swift, Swope, Asiago, UH88, Keck, Bok, etc.

SIRAH supernovae (as of Oct 2020)

