

SN2015af (PSN J19273770+5422340) discovered by Paolo Campaner on behalf of Italian Supernovae Search Project, near the galaxy NGC 6801.

, [CBAT TOCP](#) discovered 2015/08/09.024 by Paolo Campaner ([ISSP](#))
Found in [NGC 6801](#) at [R.A. = 19h27m37s.70, Decl. = +54°22'34".0](#)
Located 17" east and 12" north of the center of [NGC 6801](#) .

[Mag 19.1](#) :8/12 (18.4:8/9), Type II (z=0.0145) (References: [ATEL 7902](#) ; SN [2011df](#))

See also attached image and classification ATEL.



Asiago spectroscopic classification of two supernovae

ATel #7902; [G. Terreran, S. Benetti, E. Cappellaro, N. Elias-Rosa, P. Ochner, A. Pastorello, L. Tartaglia, L. Tomasella, M. Turatto \(INAF OAPd\)](#)

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Credential Certification: Lina Tomasella (lina.tomasella@oapd.inaf.it)

Subjects: Optical, Supernovae

The Asiago Transient Classification Program (Tomasella et al. 2014, AN, 335, 841) reports the spectroscopic classification of PSN J19273770+5422340 in the galaxy NGC 6801 and PSN J00422186+2938415 in the galaxy IC 43, both discovered by Paolo Campaner (ISSP). Informations on these transients are also available from the "Bright Supernova" website (<http://www.rochesterastronomy.org/snimages/>), The ATel, and the CBAT Transient Object Followup Reports (<http://www.cbat.eps.harvard.edu/index.html>). The observations were performed with the Asiago 1.82 m Copernico Telescope (+AFOSC; range 340-820 nm; resolution 1.4 nm).

| Name | Discovery | z | Type | Phase | Notes | PSN |
|-------------------|----------------|--------|------|-------------|-------|-----|
| J19273770+5422340 | 2015-08-09.024 | 0.0145 | II | +10d | (1) | PSN |
| J00422186+2938415 | 2015-08-06.092 | 0.0162 | Ic | +2-3 months | (2) | |

(1) Best match with normal Type-II SNe around 10 days after maximum light, adopting a redshift $z=0.014547$ (Springob et al. 2005, ApJS, 160, 149) for the host galaxy NGC 6801. A narrow H α component, superposed on the broad H α attributed to the SN, probably arises from an H II region close to the location of the SN. The expansion velocity of the ejected material, as inferred from the position of the broad absorption of H α , is about 9000 km/s.

(2) The redshift of the host galaxy (IC 43) is from Huchra et al. 1999, ApJS, 121, 287.

Classifications were done with GELATO (Harutyunyan et al. 2008, A&A, 488, 383) and SNID (Blondin and Tonry 2007, ApJ, 666, 1024). The Asiago classification spectra are posted at the website <http://sngroup.oapd.inaf.it>.