Supplementary Table S1

Supplementary Table 1. Detailed synthesis of the high frequency GPS-acquisition locations of the 30 castrated house cats *Felis catus* between January and November 2016. Time records in seconds, distances in meters, coordinates in decimal degrees (WGS84), areas in ha.

ID	Owner	Sex	Age	Northing	Easting	CORINE	Habitat	N. month	N. fixes	Mean monthly number of			Range in monthly	
										days	fixes	time	maximal distances	RD areas
1	1	♀	4	48.92303	1.97022	112, 211	Suburban	9	8862	2.2 ± 0.1	985 ± 128	194 ± 24	69 – 130	0.6 – 1.3
2	2	♀	3	49.36394	0.50423	231, 311	Rural	8	7048	1.5 ± 0.3	881 ± 233	156 ± 31	111 – 360	2.0 – 5.7
3	2	♂	5	49.36352	0.50568	231, 311	Rural	8	11106	1.8 ± 0.1	1388 ± 204	127 ± 10	117 – 315	4.6 – 8.8
4	2	♀	5	49.37928	0.41521	231, 311	Rural	8	15471	2.2 ± 0.4	1934 ± 290	102 ± 5	145 – 371	2.1 – 4.6
5	3	♀	5	48.80640	2.38905	112	Urban	6	3704	1.9 ± 0.2	617 ± 146	325 ± 79	106 – 172	1.5 – 2.1
6	4	♂	6	48.59295	2.21216	112, 211	Suburban	9	10389	2.1 ± 0.1	1154 ± 88	172 ± 15	67 – 135	1.1 – 3.4
7	5	♂	6	48.42862	2.45648	112, 313	Suburban	9	9944	2.1 ± 0.1	1105 ± 136	188 ± 32	125 – 323	2.8 – 6.6
8	6	nc	nc	48.82602	1.63801	112, 311	Suburban	6	7010	2.1 ± 0.1	1168 ± 102	158 ± 16	80 – 262	0.9 – 2.4
9	6	♂	10	48.82598	1.63815	112, 311	Suburban	9	15028	≈ 2	1670 ± 55	106 ± 3	93 – 140	0.7 – 1.3
10	7	♀	nc	48.90943	2.26291	112, 141	Urban	9	5959	2.2 ± 0.2	662 ± 72	294 ± 21	71 – 286	0.7 – 4.0
11	8	♂	2	48.94023	2.02386	112, 231	Suburban	5	9603	2.2 ± 0.2	1921 ± 71	92 ± 3	94 – 196	1.9 – 3.4
12	9	♂	2	48.65188	2.45271	112, 141	Urban	8	15901	2.0 ± 0.1	1988 ± 166	97 ± 5	83 – 353	1.0 – 1.9
13	10	♂	8	48.77220	2.27855	112, 141	Urban	11	7045	2.5 ± 0.7	640 ± 93	377 ± 71	74 – 437	0.8 – 3.3
14	11	♀	14	48.85269	2.50044	112	Urban	10	9041	2.0 ± 0.2	904 ± 167	257 ± 48	59 – 186	0.5 – 1.9
15	12	♀	4	48.80567	2.26208	112	Urban	6	3454	3.5 ± 0.6	576 ± 248	980 ± 383	64 – 105	0.7 – 0.8
16	13	♂	nc	48.85548	2.46448	112	Urban	10	11232	1.9 ± 0.1	1123 ± 96	161 ± 10	70 – 257	0.9 – 1.9
17	14	♀	2	48.80592	2.23667	112, 311	Suburban	10	6807	2.1 ± 0.1	681 ± 92	320 ± 32	205 – 480	1.5 – 9.4
18	15	♂	7	48.98602	1.72161	112, 111	Urban	8	13986	2.1 ± 0.2	1748 ± 414	164 ± 29	75 – 238	1.4 – 3.0
19	16	♀	4	48.87878	1.82578	211, 112	Rural	5	3044	1.9 ± 0.2	609 ± 81	269 ± 25	58 – 171	0.5 – 1.7
20	17a	♀	nc	48.32232	2.74660	211, 311	Rural	8	7994	1.9 ± 0.4	999 ± 236	183 ± 48	193 – 353	1.9 – 5.2
21	17b	♂	6	48.40269	2.77786	112, 311	Rural	8	9034	2.4 ± 0.7	1129 ± 466	203 ± 30	30 – 322	0.5 – 8.1
22	17c	♂	14	48.33777	2.74575	112, 311	Rural	8	7912	2.6 ± 0.5	989 ± 140	224 ± 22	75 – 216	0.8 – 3.6
23	18	♀	nc	48.79697	2.13941	112	Urban	10	2577	2.4 ± 0.4	258 ± 49	978 ± 176	54 – 142	0.8 – 2.6
24	19	♀	3	48.80033	2.16285	112, 311	Suburban	10	9122	≈ 2	912 ± 67	201 ± 19	84 – 180	1.1 – 1.9
25	20	♀	2	48.32532	2.13118	112, 311	Rural	6	6793	3.8 ± 1.4	1132 ± 214	331 ± 120	88 – 136	1.0 – 1.4
26	21	♀	6	48.8121	2.30258	112, 111	Urban	7	3543	1.5 ± 0.2	506 ± 115	328 ± 81	109 – 226	1.2 – 4.8
27	22	♀	nc	48.8536	2.45080	112	Urban	8	5417	1.9 ± 0.1	677 ± 170	240 ± 41	73 – 209	0.9 – 1.9
28	23	♂	5	48.72410	2.52888	112, 142	Urban	8	10265	1.7 ± 0.1	1283 ± 110	133 ± 20	86 – 137	0.6 – 1.1
29	24	♂	3	48.81676	2.24511	112, 111	Urban	10	17577	2.0 ± 0.2	1758 ± 288	159 ± 36	46 – 125	0.3 – 1.2
30	25	♂	nc	48.66217	2.58148	211, 311, 112	Rural	10	12249	2.7 ± 0.5	1361 ± 182	197 ± 38	126 – 427	1.6 – 7.9

Habitat variable was defined according to the landscape levels defined by the CORINE landcover project for the French mainland territory (CORINE Land Cover 2012**;** http://www.statistiques.developpement-durable.gouv.fr/donnees-ligne/li/2539/0/base-donnees-geographique-corine-land-cover-clc.html).

A total of 25 owners kindly participated in the monitoring of their pets. Twenty three aged and sexed cats were equipped monthly with a GPS Position Logger (CatTrack I, Perthold Engineering™) between January and November of 2016 (Supplementary Table 1). The logger weighed 22g and contained a Sirf III chipset programmed to acquire fixes at 1 to 5 mn intervals. Of the 30 neutered cats, 11 females and 12 males were 2-14 years old. An additional 6 castrated cats, not aged (4♀ and 2♂), and one individual neither aged nor sexed, were also monitored. We kept locations for estimated horizontal position error (EHPE) of less than 5000cm, which represented 70% of the total dataset (n=267394). Such data filtering does not guarantee that location errors are completely avoided (Morris et al. 2017). Therefore, we plotted the monthly trajectories of each cat, and manually eliminated all visually aberrant locations well outside of the polygon encompassing the area frequented by a cat.

The cats were monitored on average for 8.2 ± 0.3 months (range: 5 – 11). For each cat, monthly mean session tracking duration ranged between 1.5 ± 0.3 and 3.5 ± 0.6 days, mean number of fixes per cats ranged between 304 ± 177 and 1988 ± 180, and mean duration interval between location acquisitions between 92 ± 3 and 377 ± 71 s, except for two cats, ID15 and 23, for which mean duration between relocations were respectively 980 ± 383 s and 978 ± 176 s, corresponding to a 15 mn interval. In only two occasions out of 246 model estimates from RD-MKDE models, aberrant range areas were obtained. The first involved the cat ID21 in August 2016 with an area of 0.2 ha – which was due to a very short monitoring duration during the session (i.e., 6 hours). In March 2016, cat ID30 had a range area of 79.7 ha, which was due to unrealistic location acquisition. Excluding these two ranges, monthly home range areas of cats ranged between 0.5 and 9.4 ha (n = 244).

Morris G, Conner LM. 2017 Assessment of accuracy, fix success rate, and use of estimated horizontal position error (EHPE) to filter inaccurate data collected by a common commercially available GPS logger. *PLoS ONE***12**, e0189020. (doi 10.1371/journal.pone.0189020)

Supplementary Figure S2

A minimum distance between successive relocations (L_{min}), defining intensive use or resting must be set. Average daily speed of cats has been found to range between 0.1–0.6km/h (i.e., 0.1–0.9m/s; George 2010, Martin et al. 2013, Recio et al. 2010). As a consequence, we set L_{min} at 5m – corresponding to the minimum distance between successive relocations in order to define intensive resting activity based on a threshold speed of 0.3km/h (i.e., 0.4m/s). The maximum duration allowed for a step built by successive relocations (T_{max}) also needs to be set to warrant homogeneous movements (Benhamou 2011). It allows tracking distances longer in time without relocation to be dismissed from the location distribution, as they could reflect a lack of position data acquisition due to various habitat features. We set T_{max} to 1800s in all models. The minimum smoothing parameter (h_{min}) applied to all recorded relocations was set to 5m, close to the averaged location error for most GPS devices containing a Sirf III chipset (i.e., location error on average 6m, and 50% circular error close to 7m (Morris et al. 2017). The radius of the patches used was set to $3*h_{min}$. The maximum time threshold that the animal was allowed to spend outside the patch before considering it actually left it was set to 60s.

Choice of T_{max} in MKDE analyses can lead to variation in utilization distribution estimates (Benhamou 2011). We looked at the influence on the monthly home range size calculated from RD-MKDE models for 9 different cats (cat ID 1-7 and 28, 29; n = 75 estimates) with different value of T_{max} – all other parameters being held constant (ie., L_{min} = 5 m, h_{min} = 5 m, *radius* = $3*h_{min}$, *maxt* = 60s). We compared the 75 monthly estimates of RD-home range size calculated using T_{max} = 3600 s, to the 75 monthly estimates of RD-HR size calculated using T_{max} = 300 s, 900 s, and 1800s. We found that RD-HR estimate with the 75 monthly estimates using T_{max} = 300 s represented on average 89±1% of the RD-HR size calculated using T_{max} = 3600 s, T_{max} = 900 s represented on average 94±1%, and T_{max} = 1800 s represented on average 96±1% (Figure below).

We decided to keep T_{max} = 1800 s in all other analysis of cats home range size.

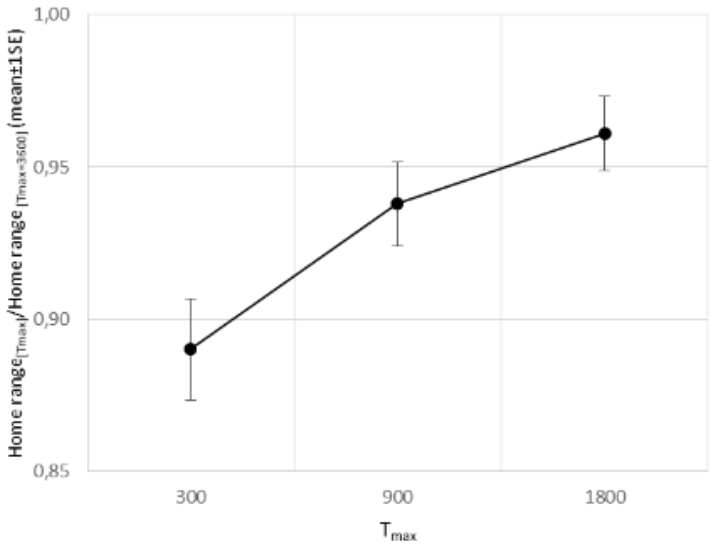

Fig. S2. Influence of varying Tmax parameter on 95%RD-MKDE home range area estimates.

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Supplementary Table S3

Supplementary Table 3a. Details of the seasonal number of events of preys brought to home recorded by owners of 16 cats over the year 2016.

Habitat	Cat ID	Owner	Prey		Winter	Spring	Summer	Autumn	Total
			categories	Identity	Jan. – Mar.	Apr. – Jun.	Jul. – Sep.	Oct. – Dec.	
Rural	2	2	MM	*Apodemus sylvaticus*	-	-	1	2	3
			MM	*Crocidura* sp.	-	2	1	-	3
			MM	***Arvicolinae*** *sp.*	-	-	1	-	1
			MM	*Microtus* sp.	-	1	-	-	1
			MM	**Muridae** (<50 g)	-	-	1	-	1
			MM	*Mus domesticus*	-	-	1	-	1
			MM	*Myodes glareolus*	-	-	-	1	1
	3	2	SB	**Turdidae** sp.	-	-	1	-	1
			MM	*Apodemus sylvaticus*	-	3	7	3	13
			MM	*Myodes glareolus*	-	1	9	-	10
			MM	*Crocidura* sp.	2	1	0	1	4
			MM	*Microtus* sp.	1	1	1	-	3
			MM	***Arvicolinae*** *sp.*	-	1	1	1	3
			MM	**Muridae** (<50 g)	-	-	1	-	1
			OTHER	*Rattus norvegicus*	1	-	-	-	
	4	2	SB	*Troglodytes troglodytes*	-	2	-	-	2
			MM	*Apodemus sylvaticus*	-	1	2	-	3
			MM	*Myodes glareolus*	-	-	1	2	3
			MM	**Soricidae** sp.	-	1	-	-	1
			MM	***Arvicolinae*** *sp.*	-	1	-	-	1
			OTHER	Medium-large sized bird	-	-	1	-	1
	5	3	SB	Small passerine	1	-	-	-	1
			SB	*Troglodytes troglodytes*	-	1	-	-	1
			SB	*Phoenicurus ochruros*	-	-	1	-	1
			SB	*Erithacus rubecula*	-	-	-	1	1
			MM	*Apodemus sylvaticus*	7	3	2	1	13
			MM	***Arvicolinae*** *sp.*	1	5	3	-	9
			MM	*Microtus* sp.	-	3	-	-	3
			MM	**Soricidae** sp.	1	1	1	-	3
			MM	*Myodes glareolus*	-	-	-	1	1
			MM	*Mus domesticus*	1	-	-	-	1
			MM	**Muridae** (<50 g)	-	-	-	-	1
			OTHER	Unidentified bird	-	1	1	-	2
	30	25	MM	*Mus domesticus*	1	-	-	1	1
			MM	**Muridae** (<50 g)	-	-	1	-	1
			OTHER	**Rodentia** (> 50 g)	-	-	1	1	2
			OTHER	**Lagomorpha**	-	-	-	1	1
			OTHER	*Pica pica*	-	1	-	-	1
Suburban	1	1	SB	*Passer* sp.	-	1	-	-	1
			SB	**Paridae** sp.	-	1	-	-	1
			MM	*Mus domesticus*	3	-	-	-	3
	6	4	SB	*Turdus merula*	-	1	-	-	1
			MM	**Soricidae** sp.	1	2	-	-	3
			OTHER	*Podarcis muralis*	-	3	-	-	4
			OTHER	Unidentified bird	-	1	-	-	1
	7	5	MM	**Muridae** (<50 g)	1	1	1	-	3
			MM	*Apodemus* sp.	-	2	-	-	2
			OTHER	*Talpa* sp.	-	1	-	-	1
	8	6	SB	*Cyanistes caeruleus*	-	1			1
			MM	***Arvicolinae*** *sp.*	-	2	1	2	5
			MM	*Apodemus* sp.	-	-	2	-	2
	9	6	SB	*Prunella modularis*	-	2	1	-	3
			SB	*Passer domesticus*	2	-	-	-	2
			SB	*Phylloscopus collybita*	-	2	-	-	2
			SB	*Turdus philomelos*	-	-	2	-	2
			SB	*Troglodytes troglodytes*	1	-	-	-	1
			SB	*Sylvia atricapilla*	-	1	-	-	1
			SB	*Turdus merula*	-	-	1	-	1
			SB	*Cyanistes caeruleus*	-	-	1	-	1
			SB	*Streptopelia decaocto*	-	-	1	-	1
			MM	*Apodemus* sp.	3	2	2	-	7
			MM	**Soricidae** sp.	1	1	4	-	6
			MM	***Arvicolinae*** *sp.*	1	2	2	-	5
			MM	*Micromys minutus*	-	1	-	-	1
			OTHER	Unidentified prey	-	-	7	-	7
			OTHER	*Podarcis muralis*	-	4	-	-	4
			OTHER	Unidentified mammal	-	1	-	-	1
			OTHER	*Columba* sp.	-	-	1	-	1
	11	8	MM	*Mus domesticus*	-	1	-	-	1
			MM	**Soricidae** sp.	-	-	2	-	2
	24	19	SB	*Turdus merula*	-	6	4	-	10
			SB	*Phoenicurus ochruros*	-	2	1	-	3
			SB	*Streptopelia decaocto*	1	-	-	-	1
			SB	*Erithacus rubecula*	1	-	-	-	1
			SB	*Cyanistes caeruleus*	-	-	1	-	1

			MM	**Soricidae** sp.	-	4	1	-	5
			MM	*Sorex coronatus*	-	-	1	-	1
			MM	*Sorex minutus*	-	-	1	-	1
			OTHER	*Rattus norvegicus*	1	-	-	-	1
			OTHER	Unidentified bird	-	1	-	-	1
Urban	16	13	SB	**Paridae** sp.	-	-	-	1	1
			MM	**Muridae** (<50 g)	-	2	2	1	5
			MM	*Mus musculus*	-	-	1	-	1
			MM	*Apodemus* sp.	1	-	-	-	1
			MM	***Arvicolinae** sp.*	1	-	-	-	1
			MM	**Soricidae** sp.	-	1	-	-	1
	26	21	MM	*Mus musculus*	2	0	0	0	2
			OTHER	**ODONATA**	0	1	0	0	1
	14	11	SB	*Periparus ater*	-	1	-	-	1
			MM	*Mus musculus*	2	3	-	-	5
			MM	**Muridae** (<50 g)	1	-	-	-	1
			OTHER	*Rattus norvegicus*	1	-	2	-	3
			OTHER	Unidentified bird	2	-	-	-	2
			OTHER	Unidentified prey	1	-	-	-	1
	15	12	MM	*Apodemus* sp.	1	0	0	0	1
			OTHER	**LEPIDOPTERA**	-	-	2	-	2
			OTHER	**ARANAE**	-	-	1	-	1
			OTHER	*Tettigonia viridissima*	-	-	1	-	1
			OTHER	*Bufo bufo*	-	-	1	-	1

Supplementary Table 3b. Details of the daily events of small birds and mammals preys brought to home recorded from 16 cats housed by 12 owners over the year 2016.

Owner	Cat_ID	hab2b	Prey_id	date_Jul	small_birds	micro_mamm
1	3	Rural	Campagnol_des_champs	170	0	1
1	3	Rural	Campagnol_non_identifie	268	0	1
1	3	Rural	Campagnol_roussatre	329	0	1
1	3	Rural	Crocidure_musette	168	0	1
1	3	Rural	Crocidure_musette	179	0	1
1	3	Rural	Crocidure_musette	257	0	1
1	3	Rural	Mulot_sylvestre	225	0	1
1	3	Rural	Mulot_sylvestre	284	0	1
1	3	Rural	Mulot_sylvestre	342	0	1
1	3	Rural	Petit_rongeur_souris_mulots_campagnols_non_identifie	240	0	1
1	3	Rural	Souris_grise	214	0	1
1	8	Rural	Campagnol_des_champs	156	0	1
1	8	Rural	Campagnol_non_identifie	57	0	1
1	8	Rural	Campagnol_non_identifie	166	0	1
1	8	Rural	Campagnol_non_identifie	200	0	1
1	8	Rural	Campagnol_roussatre	179	0	1
1	8	Rural	Campagnol_roussatre	183	0	1
1	8	Rural	Campagnol_roussatre	195	0	1
1	8	Rural	Campagnol_roussatre	203	0	1
1	8	Rural	Campagnol_roussatre	208	0	1
1	8	Rural	Campagnol_roussatre	210	0	1
1	8	Rural	Campagnol_roussatre	251	0	1
1	8	Rural	Campagnol_roussatre	252	0	1
1	8	Rural	Campagnol_roussatre	257	0	1
1	8	Rural	Campagnol_roussatre	267	0	1
1	8	Rural	Campagnol_souterrain	204	0	1
1	8	Rural	Crocidure_musette	168	0	1
1	8	Rural	Crocidure_musette	340	0	1
1	8	Rural	Grive_non_identifiee	224	1	0
1	8	Rural	Mulot_non_identifie	253	0	1
1	8	Rural	Mulot_sylvestre	15	0	1
1	8	Rural	Mulot_sylvestre	166	0	1
1	8	Rural	Mulot_sylvestre	166	0	1
1	8	Rural	Mulot_sylvestre	168	0	1
1	8	Rural	Mulot_sylvestre	186	0	1
1	8	Rural	Mulot_sylvestre	188	0	1
1	8	Rural	Mulot_sylvestre	190	0	1
1	8	Rural	Mulot_sylvestre	190	0	1
1	8	Rural	Mulot_sylvestre	191	0	1
1	8	Rural	Mulot_sylvestre	252	0	1
1	8	Rural	Mulot_sylvestre	294	0	1
1	8	Rural	Mulot_sylvestre	301	0	1
1	8	Rural	Mulot_sylvestre	332	0	1
1	8	Rural	Musaraigne_couronnee	59	0	1
1	8	Rural	Petit_campagnol_Microtus_Myodes_non_identifie	339	0	1
1	8	Rural	Petit_rongeur_souris_mulots_campagnols_non_identifie	224	0	1
1	8	Rural	Rat_surmulot	59	0	0
1	10	Rural	Campagnol_non_identifie	128	0	1
1	10	Rural	Campagnol_roussatre	255	0	1
1	10	Rural	Campagnol_roussatre	282	0	1
1	10	Rural	Campagnol_roussatre	298	0	1
1	10	Rural	Mulot_sylvestre	166	0	1

1	10	Rural	Mulot_sylvestre	242	0	1
1	10	Rural	Mulot_sylvestre	250	0	1
1	10	Rural	Musaraigne_non_identifiee	145	0	1
1	10	Rural	Oiseau_de_taille_moyenne-grande_non_identifie	212	0	0
1	10	Rural	Troglodyte_mignon	102	1	0
1	10	Rural	Troglodyte_mignon	149	1	0
1	11	Rural	Campagnol_des_champs	138	0	1
1	11	Rural	Campagnol_des_champs	141	0	1
1	11	Rural	Campagnol_des_champs	148	0	1
1	11	Rural	Campagnol_non_identifie	79	0	1
1	11	Rural	Campagnol_non_identifie	101	0	1
1	11	Rural	Campagnol_non_identifie	106	0	1
1	11	Rural	Campagnol_non_identifie	107	0	1
1	11	Rural	Campagnol_non_identifie	133	0	1
1	11	Rural	Campagnol_non_identifie	155	0	1
1	11	Rural	Campagnol_non_identifie	183	0	1
1	11	Rural	Campagnol_non_identifie	187	0	1
1	11	Rural	Campagnol_non_identifie	194	0	1
1	11	Rural	Campagnol_roussatre	330	0	1
1	11	Rural	Mulot_sylvestre	18	0	1
1	11	Rural	Mulot_sylvestre	31	0	1
1	11	Rural	Mulot_sylvestre	32	0	1
1	11	Rural	Mulot_sylvestre	75	0	1
1	11	Rural	Mulot_sylvestre	77	0	1
1	11	Rural	Mulot_sylvestre	85	0	1
1	11	Rural	Mulot_sylvestre	86	0	1
1	11	Rural	Mulot_sylvestre	134	0	1
1	11	Rural	Mulot_sylvestre	143	0	1
1	11	Rural	Mulot_sylvestre	166	0	1
1	11	Rural	Mulot_sylvestre	216	0	1
1	11	Rural	Mulot_sylvestre	224	0	1
1	11	Rural	Mulot_sylvestre	330	0	1
1	11	Rural	Musaraigne_non_identifiee	27	0	1
1	11	Rural	Musaraigne_non_identifiee	58	0	1
1	11	Rural	Musaraigne_non_identifiee	148	0	1
1	11	Rural	Musaraigne_non_identifiee	200	0	1
1	11	Rural	Oiseau_non_identifie	166	0	0
1	11	Rural	Oiseau_non_identifie	192	0	0
1	11	Rural	Petit_passereau_oiseau_non_identifie	78	1	0
1	11	Rural	Rouge-gorge	294	1	0
1	11	Rural	Rouge-queue_noir	224	1	0
1	11	Rural	Troglodyte_mignon	175	1	0
2	9	Rural	Gros_rongeur_rats_rats_musques_non_identifie	263	0	0
2	9	Rural	Gros_rongeur_rats_rats_musques_non_identifie	316	0	0
2	9	Rural	Lagomorphe_lapins_lievres_non_identifie	304	0	0
2	9	Rural	Petit_rongeur_souris_mulots_campagnols_non_identifie	262	0	1
2	9	Rural	Pie_bavarde	141	0	0
2	9	Rural	Souris_grise	4	0	1
2	9	Rural	Souris_grise	308	0	1
3	4	Suburban	Mesange_non_identifiee	127	1	0
3	4	Suburban	Moineau_non_identifie	141	1	0
3	4	Suburban	Souris_grise	52	0	1
3	4	Suburban	Souris_grise	67	0	1
3	4	Suburban	Souris_grise	78	0	1
4	5	Suburban	Lezard_des_murailles	128	0	0
4	5	Suburban	Merle_noir	161	1	0
4	5	Suburban	Musaraigne_indeterminee	97	0	1
4	5	Suburban	Musaraigne_indeterminee	154	0	1
4	5	Suburban	Musaraigne_non_identifiee	60	0	1
4	5	Suburban	Oiseau_non_identifie	154	0	0
4	5	Suburban	Oiseau_non_identifie	160	0	0
4	5	Suburban	Oiseau_non_identifie	160	0	0
5	16	Suburban	Mulot_non_identifie	112	0	1
5	16	Suburban	Mulot_non_identifie	159	0	1
5	16	Suburban	Petit_rongeur_souris_mulots_campagnols_non_identifie	74	0	1
5	16	Suburban	Petit_rongeur_souris_mulots_campagnols_non_identifie	91	0	1
5	16	Suburban	Petit_rongeur_souris_mulots_campagnols_non_identifiemm	218	0	1
5	16	Suburban	Taupe	139	0	0
6	2	Suburban	Mesange_bleue	154	1	0
6	2	Suburban	Mulot_indetermine	243	0	1
6	2	Suburban	Mulot_indetermine	256	0	1
6	2	Suburban	Petit_campagnol_indetermine	162	0	1
6	2	Suburban	Petit_campagnol_indetermine	170	0	1
6	2	Suburban	Petit_campagnol_indetermine	205	0	1
6	2	Suburban	Petit_campagnol_indetermine	301	0	1
6	2	Suburban	Petit_campagnol_indetermine	309	0	1
7	15	Suburban	Accenteur_mouchet	151	1	0
7	15	Suburban	Accenteur_mouchet	164	1	0
7	15	Suburban	Accenteur_mouchet	189	1	0
7	15	Suburban	Fauvette_a_tete_noire	174	1	0
7	15	Suburban	Grive_musicienne	223	1	0
7	15	Suburban	Grive_musicienne	252	1	0
7	15	Suburban	Lezard_des_murailles	139	0	0

7	15	Suburban	Lezard_des_murailles	147	0	0
7	15	Suburban	Lezard_des_murailles	160	0	0
7	15	Suburban	Lezard_des_murailles	170	0	0
7	15	Suburban	Mammifere_non_identifie	92	0	0
7	15	Suburban	Merle_noir	253	1	0
7	15	Suburban	Mesange_bleue	187	1	0
7	15	Suburban	Moineau_domestique	16	1	0
7	15	Suburban	Moineau_domestique	78	1	0
7	15	Suburban	Mulot_indetermine	3	0	1
7	15	Suburban	Mulot_indetermine	25	0	1
7	15	Suburban	Mulot_indetermine	45	0	1
7	15	Suburban	Mulot_indetermine	97	0	1
7	15	Suburban	Mulot_indetermine	157	0	1
7	15	Suburban	Mulot_indetermine	215	0	1
7	15	Suburban	Mulot_indetermine	246	0	1
7	15	Suburban	Musaraigne_indeterminee	84	0	1
7	15	Suburban	Musaraigne_indeterminee	182	0	1
7	15	Suburban	Musaraigne_indeterminee	186	0	1
7	15	Suburban	Musaraigne_indeterminee	221	0	1
7	15	Suburban	Musaraigne_indeterminee	241	0	1
7	15	Suburban	Musaraigne_indeterminee	244	0	1
7	15	Suburban	pas_dans_propositions	253	0	0
7	15	Suburban	pas_dans_propositions	253	0	0
7	15	Suburban	pas_dans_propositions	253	0	0
7	15	Suburban	pas_dans_propositions	253	0	0
7	15	Suburban	pas_dans_propositions	253	0	0
7	15	Suburban	pas_dans_propositions	253	0	0
7	15	Suburban	pas_dans_propositions	253	0	0
7	15	Suburban	Petit_campagnol_indetermine	11	0	1
7	15	Suburban	Petit_campagnol_indetermine	91	0	1
7	15	Suburban	Petit_campagnol_indetermine	171	0	1
7	15	Suburban	Petit_campagnol_indetermine	213	0	1
7	15	Suburban	Petit_campagnol_indetermine	220	0	1
7	15	Suburban	Pigeon_biset/ramier	247	0	0
7	15	Suburban	Pouillot_veloce	156	1	0
7	15	Suburban	Pouillot_veloce	167	1	0
7	15	Suburban	Rat_des_moissons	168	0	1
7	15	Suburban	Tourterelle_turque	250	0	0
7	15	Suburban	Troglodyte_mignon	63	1	0
8	6	Suburban	Musaraigne_indeterminee	263	0	1
8	6	Suburban	Musaraigne_indeterminee	274	0	1
8	6	Suburban	Souris_domestique	174	0	1
9	12	Suburban	Merle_noir	121	1	0
9	12	Suburban	Merle_noir	121	1	0
9	12	Suburban	Merle_noir	122	1	0
9	12	Suburban	Merle_noir	158	1	0
9	12	Suburban	Merle_noir	161	1	0
9	12	Suburban	Merle_noir	179	1	0
9	12	Suburban	Merle_noir	196	1	0
9	12	Suburban	Merle_noir	199	1	0
9	12	Suburban	Merle_noir	199	1	0
9	12	Suburban	Merle_noir	200	1	0
9	12	Suburban	Mesange_charbonniere	186	1	0
9	12	Suburban	Musaraigne_carrelet	238	0	1
9	12	Suburban	Musaraigne_non_identifiee	127	0	1
9	12	Suburban	Musaraigne_non_identifiee	158	0	1
9	12	Suburban	Musaraigne_non_identifiee	167	0	1
9	12	Suburban	Musaraigne_non_identifiee	153	0	1
9	12	Suburban	Musaraigne_non_identifiee	189	0	1
9	12	Suburban	Musaraigne_pygmee	188	0	1
9	12	Suburban	Oiseau_non_identifie	158	0	0
9	12	Suburban	Rat_surmulot	24	0	0
9	12	Suburban	Rouge-gorge	82	1	0
9	12	Suburban	Rouge-queue_noir	151	1	0
9	12	Suburban	Rouge-queue_noir	152	1	0
9	12	Suburban	Rouge-queue_noir	188	1	0
9	12	Suburban	Tourterelle_turque	67	0	0
10	13	Urban	inconnue	2	0	0
10	13	Urban	Petit_rongeur_souris_mulots_campagnols_non_identifie	2	0	1
10	13	Urban	Rat_gris	2	0	0
10	13	Urban	Oiseau_non_identifie	49	0	0
10	13	Urban	Oiseau_non_identifie	49	0	0
11	7	Urban	Mulot_sylvestre	49	0	1
10	1	Urban	Souris_grise	53	0	1
10	1	Urban	Souris_grise	53	0	1
10	13	Urban	Souris_grise	53	0	1
10	13	Urban	Souris_grise	53	0	1
12	14	Urban	Mulot_indetermine	81	0	1
12	14	Urban	Petit_campagnol_indetermine	93	0	1
12	14	Urban	Petit_rongeur_souris_mulots_campagnols_non_identifie	150	0	1
12	14	Urban	Musaraigne_non_identifiee	156	0	1
12	14	Urban	Petit_rongeur_souris_mulots_campagnols_non_identifie	161	0	1
10	13	Urban	Mesange_noire	170	1	0

10	13	Urban	Souris_grise	170	0	1
10	13	Urban	Souris_grise	170	0	1
10	1	Urban	libellule	171	0	0
10	13	Urban	Souris_grise	174	0	1
12	14	Urban	Souris_grise	211	0	1
10	13	Urban	Rat	227	0	0
10	13	Urban	Rat	227	0	0
11	7	Urban	Crapaud_commun	232	0	0
11	7	Urban	grande_sauterelle_verte	232	0	0
11	7	Urban	papillon_de_nuit_espece_inconnue	232	0	0
11	7	Urban	Araignee_sp	252	0	0
11	7	Urban	Papillon_de_nuit	252	0	0
12	14	Urban	Petit_rongeur_souris_mulots_campagnols_non_identifie	273	0	1
12	14	Urban	Petit_rongeur_souris_mulots_campagnols_non_identifie	273	0	1
12	14	Urban	Mesange_non_identifiee	330	1	0
12	14	Urban	Petit_rongeur_souris_mulots_campagnols_non_identifie	330	0	1

Supplementary Table S4 - Raw data from the RD-MKDE analysis

catID	sex	age	c_age	Owner	hab	COR	mo	date	nfix	day	dateJ	RD	Easting	Northing
1	f	4	less_5_yrs_old	BARTHOMEUF	suburban	112_211	feb	12/02/2016	574	3	42	0.71	573160.3	135908.4
1	f	4	less_5_yrs_old	BARTHOMEUF	suburban	112_211	mar	11/03/2016	1225	2	70	1.27	573160.8	135914.1
1	f	4	less_5_yrs_old	BARTHOMEUF	suburban	112_211	apr	08/04/2016	731	2	98	0.85	573158.0	135910.0
1	f	4	less_5_yrs_old	BARTHOMEUF	suburban	112_211	may	13/05/2016	897	2	133	0.64	573162.1	135909.2
1	f	4	less_5_yrs_old	BARTHOMEUF	suburban	112_211	jun	11/06/2016	948	2	162	1.16	573155.5	135908.3
1	f	4	less_5_yrs_old	BARTHOMEUF	suburban	112_211	jul	14/07/2016	1576	2.5	195	0.83	573155.3	135915.7
1	f	4	less_5_yrs_old	BARTHOMEUF	suburban	112_211	aug	11/08/2016	1487	2	223	0.85	573156.3	135918.7
1	f	4	less_5_yrs_old	BARTHOMEUF	suburban	112_211	sep	16/09/2016	678	2	259	1.01	573161.7	135913.6
1	f	4	less_5_yrs_old	BARTHOMEUF	suburban	112_211	oct	07/10/2016	746	2	280	0.94	573161.6	135907.7
2	f	3	less_5_yrs_old	BONJEAN	rural	231_311	mar	15/03/2016	1260	2.3	74	4.37	466914.2	186523.9
2	f	3	less_5_yrs_old	BONJEAN	rural	231_311	apr	10/04/2016	614	2	100	4.14	466938.5	186519.7
2	f	3	less_5_yrs_old	BONJEAN	rural	231_311	may	10/05/2016	451	1.3	130	5.22	466942.3	186505.3
2	f	3	less_5_yrs_old	BONJEAN	rural	231_311	jun	15/06/2016	1039	2.5	166	5.71	466920.4	186519.7
2	f	3	less_5_yrs_old	BONJEAN	rural	231_311	jul	08/07/2016	749	0.7	189	4.85	466897.3	186521.0
2	f	3	less_5_yrs_old	BONJEAN	rural	231_311	aug	10/08/2016	2182	2	222	3.89	466963.9	186466.2
2	f	3	less_5_yrs_old	BONJEAN	rural	231_311	sep	10/09/2016	500	1	253	2.43	466966.3	186450.3
2	f	3	less_5_yrs_old	BONJEAN	rural	231_311	oct	20/10/2016	254	0.3	293	1.98	466942.2	186489.8
3	m	5	above_5_yrs_old	BONJEAN	rural	231_311	mar	09/03/2016	1072	1.7	68	6.90	467070.7	186428.2
3	m	5	above_5_yrs_old	BONJEAN	rural	231_311	apr	07/04/2016	920	1.3	97	8.84	467024.6	186455.2
3	m	5	above_5_yrs_old	BONJEAN	rural	231_311	may	08/05/2016	1270	1.7	128	5.03	467028.6	186427.8
3	m	5	above_5_yrs_old	BONJEAN	rural	231_311	jun	09/06/2016	1516	2	160	4.64	467050.4	186428.5
3	m	5	above_5_yrs_old	BONJEAN	rural	231_311	jul	14/07/2016	2764	2.5	195	4.62	467051.4	186422.5
3	m	5	above_5_yrs_old	BONJEAN	rural	231_311	aug	10/08/2016	1601	2	222	5.81	467061.5	186418.9
3	m	5	above_5_yrs_old	BONJEAN	rural	231_311	sep	07/09/2016	956	2	250	5.97	466992.1	186519.7
3	m	5	above_5_yrs_old	BONJEAN	rural	231_311	oct	11/10/2016	1007	1.5	284	8.09	467015.1	186558.3
4	f	5	above_5_yrs_old	BONJEAN	rural	231_311	mar	27/03/2016	1395	2	86	3.61	460512.4	188361.9
4	f	5	above_5_yrs_old	BONJEAN	rural	231_311	apr	13/04/2016	3454	4	103	4.22	460512.9	188358.2
4	f	5	above_5_yrs_old	BONJEAN	rural	231_311	may	14/05/2016	2044	2	134	2.70	460517.2	188353.6
4	f	5	above_5_yrs_old	BONJEAN	rural	231_311	jun	15/06/2016	1770	1.75	166	2.32	460532.7	188352.2
4	f	5	above_5_yrs_old	BONJEAN	rural	231_311	jul	14/07/2016	851	1	195	2.07	460522.6	188378.2
4	f	5	above_5_yrs_old	BONJEAN	rural	231_311	aug	06/08/2016	2416	3	218	2.93	460526.1	188363.9
4	f	5	above_5_yrs_old	BONJEAN	rural	231_311	sep	11/09/2016	1893	1.5	254	4.55	460520.1	188355.7
4	f	5	above_5_yrs_old	BONJEAN	rural	231_311	oct	17/10/2016	1648	2	290	3.49	460495.7	188397.1
5	f	5	above_5_yrs_old	CALVAS	urban	112_	jan	09/01/2016	282	1.5	8	2.13	603848.4	122881.3
5	f	5	above_5_yrs_old	CALVAS	urban	112_	feb	05/02/2016	457	1.7	35	1.88	603867.1	122892.4
5	f	5	above_5_yrs_old	CALVAS	urban	112_	mar	05/03/2016	358	2.5	64	1.49	603847.7	122885.4
5	f	5	above_5_yrs_old	CALVAS	urban	112_	apr	02/04/2016	1171	2	92	1.62	603863.7	122884.2
5	f	5	above_5_yrs_old	CALVAS	urban	112_	may	14/05/2016	717	2	134	2.13	603853.0	122865.2
5	f	5	above_5_yrs_old	CALVAS	urban	112_	jun	11/06/2016	719	1.5	162	1.49	603864.8	122873.1
6	m	6	above_5_yrs_old	CHAPDELAINE	suburban	112_211	jan	07/01/2016	916	2	6	1.46	590821.6	99133.73
6	m	6	above_5_yrs_old	CHAPDELAINE	suburban	112_211	feb	07/02/2016	1345	2	37	1.12	590813.6	99133.87
6	m	6	above_5_yrs_old	CHAPDELAINE	suburban	112_211	mar	06/03/2016	1447	2	65	1.61	590818.7	99150.57
6	m	6	above_5_yrs_old	CHAPDELAINE	suburban	112_211	apr	12/04/2016	929	2	102	1.52	590831.9	99153.97
6	m	6	above_5_yrs_old	CHAPDELAINE	suburban	112_211	may	07/05/2016	1296	2	127	1.89	590833.9	99157.06
6	m	6	above_5_yrs_old	CHAPDELAINE	suburban	112_211	jun	10/06/2016	1107	1.5	161	2.42	590846.7	99167.51
6	m	6	above_5_yrs_old	CHAPDELAINE	suburban	112_211	jul	11/07/2016	741	2	192	3.37	590841.3	99166.81
6	m	6	above_5_yrs_old	CHAPDELAINE	suburban	112_211	sep	12/09/2016	1411	2	255	1.85	590821.5	99145.67
6	m	6	above_5_yrs_old	CHAPDELAINE	suburban	112_211	oct	11/10/2016	1194	3	284	1.81	590828.0	99142.28
7	m	6	above_5_yrs_old	CLEMENT	suburban	112_313	jan	05/01/2016	491	2	4	3.61	608875.4	80878.30
7	m	6	above_5_yrs_old	CLEMENT	suburban	112_313	feb	05/02/2016	665	2.5	35	4.87	608884.2	80872.39
7	m	6	above_5_yrs_old	CLEMENT	suburban	112_313	mar	15/03/2016	866	2	74	5.77	608851.6	80835.83
7	m	6	above_5_yrs_old	CLEMENT	suburban	112_313	apr	06/04/2016	1081	2	96	4.80	608876.7	80869.97
7	m	6	above_5_yrs_old	CLEMENT	suburban	112_313	may	06/05/2016	1089	2	126	6.61	608800.1	80837.15
7	m	6	above_5_yrs_old	CLEMENT	suburban	112_313	jun	08/06/2016	1301	2	159	4.82	608883.8	80886.49
7	m	6	above_5_yrs_old	CLEMENT	suburban	112_313	jul	05/07/2016	1540	2	186	3.74	608897.1	80890.56
7	m	6	above_5_yrs_old	CLEMENT	suburban	112_313	aug	07/08/2016	1667	2	219	2.78	608907.4	80889.37
7	m	6	above_5_yrs_old	CLEMENT	suburban	112_313	sep	08/09/2016	1244	2	251	2.99	608903.0	80884.68
8	NA	NA	NA	COINTREAU	suburban	112_311	jan	10/01/2016	1095	2	9	1.07	548719.5	125293.6
8	NA	NA	NA	COINTREAU	suburban	112_311	feb	06/02/2016	1126	2	36	0.93	548718.8	125296.2
8	NA	NA	NA	COINTREAU	suburban	112_311	mar	09/03/2016	1363	2	68	1.44	548716.8	125297.2
8	NA	NA	NA	COINTREAU	suburban	112_311	apr	08/04/2016	1138	2	98	1.21	548717.4	125298.6
8	NA	NA	NA	COINTREAU	suburban	112_311	may	14/05/2016	1470	2.5	134	2.37	548713.5	125295.1
8	NA	NA	NA	COINTREAU	suburban	112_311	jun	15/06/2016	818	2	166	2.35	548701.3	125309.2
9	m	10	above_5_yrs_old	COINTREAU	suburban	112_311	jan	05/01/2016	1521	2	4	0.75	548725.0	125293.9
9	m	10	above_5_yrs_old	COINTREAU	suburban	112_311	feb	01/02/2016	1959	2	31	0.67	548726.6	125293.1
9	m	10	above_5_yrs_old	COINTREAU	suburban	112_311	mar	06/03/2016	1733	2	65	0.74	548726.7	125293.6
9	m	10	above_5_yrs_old	COINTREAU	suburban	112_311	apr	13/04/2016	1737	2	103	0.99	548726.7	125291.6
9	m	10	above_5_yrs_old	COINTREAU	suburban	112_311	may	17/05/2016	1470	2	137	0.88	548723.9	125293.0
9	m	10	above_5_yrs_old	COINTREAU	suburban	112_311	jun	07/06/2016	1697	2	158	0.67	548723.8	125292.3
9	m	10	above_5_yrs_old	COINTREAU	suburban	112_311	jul	12/07/2016	1513	2	193	1.22	548724.7	125292.0
9	m	10	above_5_yrs_old	COINTREAU	suburban	112_311	sep	07/09/2016	1609	2	250	1.25	548722.5	125295.3
9	m	10	above_5_yrs_old	COINTREAU	suburban	112_311	oct	12/10/2016	1788	2	285	0.80	548726.4	125293.3
10	f	NA	NA	COURCOUX	urban	112_121	feb	12/02/2016	703	2	42	1.79	594592.1	134379.5
10	f	NA	NA	COURCOUX	urban	112_121	mar	11/03/2016	453	2	70	0.68	594597.2	134351.2
10	f	NA	NA	COURCOUX	urban	112_121	apr	16/04/2016	697	2	106	1.01	594600.4	134356.0
10	f	NA	NA	COURCOUX	urban	112_121	may	18/05/2016	596	2	138	0.80	594595.3	134351.7
10	f	NA	NA	COURCOUX	urban	112_121	jun	16/06/2016	362	1.5	167	1.88	594626.2	134315.1
10	f	NA	NA	COURCOUX	urban	112_121	jul	09/07/2016	849	2.5	190	1.25	594605.9	134323.2
10	f	NA	NA	COURCOUX	urban	112_121	aug	23/08/2016	801	2	235	4.02	594614.9	134303.3
10	f	NA	NA	COURCOUX	urban	112_121	sep	17/09/2016	500	2	260	2.15	594607.1	134337.0
10	f	NA	NA	COURCOUX	urban	112_121	oct	15/10/2016	998	3.5	288	3.01	594610.1	134331.0

11	m	2	less_5_yrs_old	DEVES	suburban	112_231	feb	08/02/2016	1923	2	38	2.53	577088.6	137815.4
11	m	2	less_5_yrs_old	DEVES	suburban	112_231	mar	13/03/2016	2154	2	72	3.39	577118.9	137796.7
11	m	2	less_5_yrs_old	DEVES	suburban	112_231	apr	05/04/2016	1812	3	95	3.10	577105.8	137797.5
11	m	2	less_5_yrs_old	DEVES	suburban	112_231	may	18/05/2016	1805	2	138	1.88	577086.6	137826.9
11	m	2	less_5_yrs_old	DEVES	suburban	112_231	jun	11/06/2016	1909	2	162	2.16	577084.0	137804.2
12	m	2	less_5_yrs_old	DUBOIS	urban	112_141	jan	06/01/2016	1852	1.5	5	1.87	608565.5	105707.5
12	m	2	less_5_yrs_old	DUBOIS	urban	112_141	feb	06/02/2016	1816	2	36	1.10	608564.7	105709.6
12	m	2	less_5_yrs_old	DUBOIS	urban	112_141	mar	06/03/2016	2251	2	65	1.03	608563.8	105705.5
12	m	2	less_5_yrs_old	DUBOIS	urban	112_141	apr	10/04/2016	2647	2.5	100	1.02	608564.3	105705.5
12	m	2	less_5_yrs_old	DUBOIS	urban	112_141	may	08/05/2016	2423	2.5	128	1.20	608562.9	105698.0
12	m	2	less_5_yrs_old	DUBOIS	urban	112_141	jun	09/06/2016	1288	1.5	160	1.45	608555.8	105701.6
12	m	2	less_5_yrs_old	DUBOIS	urban	112_141	jul	13/07/2016	1636	2.3	194	1.10	608559.7	105697.0
12	m	2	less_5_yrs_old	DUBOIS	urban	112_141	aug	21/08/2016	1988	2	233	1.22	608555.0	105691.8
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	jan	02/01/2016	902	8.5	1	1.37	595742.2	119079.2
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	feb	06/02/2016	337	2	36	2.39	595744.1	119072.5
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	mar	12/03/2016	761	2	71	1.27	595744.1	119072.4
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	apr	08/04/2016	925	2.5	98	1.21	595742.9	119079.6
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	may	14/05/2016	562	2.5	134	1.86	595737.5	119074.4
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	jun	18/06/2016	977	2	169	1.52	595739.1	119076.5
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	jul	16/07/2016	753	1.5	197	1.78	595737.1	119073.6
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	aug	13/08/2016	952	2	225	3.29	595740.0	119079.7
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	sep	17/09/2016	397	1.3	260	0.76	595736.6	119073.3
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	oct	22/10/2016	283	2	295	1.05	595734.3	119073.8
13	m	8	above_5_yrs_old	FLANDIN	urban	112_141	nov	19/11/2016	196	1.5	323	1.31	595735.9	119068.2
14	f	14	above_5_yrs_old	FROGER	urban	112_	jan	10/01/2016	314	2	9	1.35	612033.4	128034.1
14	f	14	above_5_yrs_old	FROGER	urban	112_	feb	08/02/2016	400	2	38	0.92	612032.2	128034.5
14	f	14	above_5_yrs_old	FROGER	urban	112_	mar	07/03/2016	577	1.5	66	1.19	612030.5	128035.3
14	f	14	above_5_yrs_old	FROGER	urban	112_	apr	06/04/2016	556	2	96	0.73	612026.1	128040.6
14	f	14	above_5_yrs_old	FROGER	urban	112_	may	10/05/2016	799	2	130	1.02	612021.7	128047.5
14	f	14	above_5_yrs_old	FROGER	urban	112_	jun	08/06/2016	1161	1.5	159	0.49	612028.2	128038.3
14	f	14	above_5_yrs_old	FROGER	urban	112_	jul	05/07/2016	953	1.5	186	0.82	612027.7	128039.8
14	f	14	above_5_yrs_old	FROGER	urban	112_	aug	10/08/2016	1774	2.5	222	0.55	612028.3	128035.5
14	f	14	above_5_yrs_old	FROGER	urban	112_	sep	15/09/2016	838	3	258	0.58	612028.1	128036.7
14	f	14	above_5_yrs_old	FROGER	urban	112_	oct	10/10/2016	1669	2	283	1.88	612039.7	128038.6
15	f	4	less_5_yrs_old	GOURMAUD	urban	112_	jan	11/01/2016	185	5	10	0.75	594534.5	122798.7
15	f	4	less_5_yrs_old	GOURMAUD	urban	112_	feb	03/02/2016	361	3	33	0.78	594534.4	122804.7
15	f	4	less_5_yrs_old	GOURMAUD	urban	112_	mar	02/03/2016	200	2	61	0.73	594539.5	122812.1
15	f	4	less_5_yrs_old	GOURMAUD	urban	112_	apr	08/04/2016	846	4	98	0.70	594537.1	122805.5
15	f	4	less_5_yrs_old	GOURMAUD	urban	112_	jun	19/06/2016	1590	3.3	170	0.69	594529.5	122794.3
16	m	NA	NA	GUILLEMOT	urban	112_	jan	10/01/2016	1273	2.5	9	1.06	609386.3	128336.2
16	m	NA	NA	GUILLEMOT	urban	112_	feb	07/02/2016	891	2	37	1.51	609390.1	128344.8
16	m	NA	NA	GUILLEMOT	urban	112_	mar	13/03/2016	1224	2	72	1.21	609390.2	128337.1
16	m	NA	NA	GUILLEMOT	urban	112_	apr	09/04/2016	1359	2	99	1.08	609389.7	128342.3
16	m	NA	NA	GUILLEMOT	urban	112_	may	12/05/2016	1470	2	132	0.92	609394.5	128345.1
16	m	NA	NA	GUILLEMOT	urban	112_	jun	18/06/2016	622	1	169	1.10	609395.5	128348.6
16	m	NA	NA	GUILLEMOT	urban	112_	jul	14/07/2016	1412	2	195	1.21	609390.2	128350.7
16	m	NA	NA	GUILLEMOT	urban	112_	aug	15/08/2016	818	2	227	0.88	609392.4	128348.8
16	m	NA	NA	GUILLEMOT	urban	112_	sep	26/09/2016	1155	2	269	1.04	609387.3	128343.4
16	m	NA	NA	GUILLEMOT	urban	112_	oct	16/10/2016	1008	2	289	1.89	609392.1	128347.5
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	jan	07/01/2016	1345	2.5	6	1.60	592695.9	122841.2
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	feb	08/02/2016	689	2	38	3.87	592678.5	122842.1
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	mar	10/03/2016	839	2	69	2.26	592668.2	122834.5
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	apr	05/04/2016	781	2.5	95	9.35	592601.3	122783.9
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	may	05/05/2016	581	1.5	125	6.91	592660.9	122826.9
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	jun	06/06/2016	703	2	157	2.14	592670.3	122836.6
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	jul	07/07/2016	457	2.5	188	2.90	592682.5	122834.2
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	aug	06/08/2016	492	2	218	2.34	592661.5	122829.6
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	sep	07/09/2016	532	2.5	250	6.65	592660.5	122825.9
17	f	2	less_5_yrs_old	LACHENAUD	suburban	112_311	oct	05/10/2016	388	1.7	278	1.48	592666.1	122831.3
18	f	7	above_5_yrs_old	LE_CREFF	urban	112_111	jan	12/01/2016	1137	1.5	11	2.95	555013.9	143042.8
18	f	7	above_5_yrs_old	LE_CREFF	urban	112_111	feb	14/02/2016	1170	1.3	44	2.84	555003.7	143054.3
18	f	7	above_5_yrs_old	LE_CREFF	urban	112_111	mar	14/03/2016	975	2	73	2.06	555008.6	143033.4
18	f	7	above_5_yrs_old	LE_CREFF	urban	112_111	apr	12/04/2016	1636	2.5	102	2.51	554997.9	143045.6
18	f	7	above_5_yrs_old	LE_CREFF	urban	112_111	jul	03/07/2016	4347	17	184	1.53	555000.6	143028.6
18	f	7	above_5_yrs_old	LE_CREFF	urban	112_111	aug	16/08/2016	1783	2.3	228	1.53	554986.6	143032.0
18	f	7	above_5_yrs_old	LE_CREFF	urban	112_111	sep	13/09/2016	1171	1.5	256	1.43	554985.5	143038.7
18	f	7	above_5_yrs_old	LE_CREFF	urban	112_111	oct	10/10/2016	1767	1.5	283	1.84	554997.7	143028.9
19	f	4	less_5_yrs_old	MAHUT	rural	211_112	jan	09/01/2016	398	1.3	8	1.70	562538.3	131050.2
19	f	4	less_5_yrs_old	MAHUT	rural	211_112	feb	13/02/2016	502	2	43	0.68	562539.4	131054.3
19	f	4	less_5_yrs_old	MAHUT	rural	211_112	mar	11/03/2016	612	2	70	0.52	562541.3	131054.8
19	f	4	less_5_yrs_old	MAHUT	rural	211_112	apr	16/04/2016	773	2	106	0.81	562542.8	131056.2
19	f	4	less_5_yrs_old	MAHUT	rural	211_112	may	07/05/2016	759	2	127	1.05	562542.1	131052.5
20	f	NA	NA	MATRAY_a	rural	211_311	mar	15/03/2016	355	2	74	2.07	630407.4	69136.78
20	f	NA	NA	MATRAY_a	rural	211_311	apr	18/04/2016	435	0.5	108	5.20	630424.6	69146.08
20	f	NA	NA	MATRAY_a	rural	211_311	may	14/05/2016	228	0.3	134	2.44	630400.2	69159.53
20	f	NA	NA	MATRAY_a	rural	211_311	jun	07/06/2016	1654	3	158	1.93	630407.9	69126.38
20	f	NA	NA	MATRAY_a	rural	211_311	jul	05/07/2016	1572	2.5	186	2.13	630416.1	69127.53
20	f	NA	NA	MATRAY_a	rural	211_311	aug	03/08/2016	1343	2.3	215	3.76	630420.8	69125.30
20	f	NA	NA	MATRAY_a	rural	211_311	sep	13/09/2016	1670	2.5	256	1.98	630418.0	69123.50
20	f	NA	NA	MATRAY_a	rural	211_311	oct	08/10/2016	737	2	281	3.41	630405.6	69136.82
21	m	6	above_5_yrs_old	MATRAY_b	rural	112_311	mar	12/03/2016	921	2	71	7.69	632691.3	78097.30
21	m	6	above_5_yrs_old	MATRAY_b	rural	112_311	apr	12/04/2016	970	2.5	102	5.34	632682.1	78077.06
21	m	6	above_5_yrs_old	MATRAY_b	rural	112_311	may	25/05/2016	570	2	145	5.27	632662.2	78077.29
21	m	6	above_5_yrs_old	MATRAY_b	rural	112_311	jun	20/06/2016	4136	7	171	3.85	632683.8	78080.20
21	m	6	above_5_yrs_old	MATRAY_b	rural	112_311	jul	29/07/2016	831	2.5	210	3.70	632680.3	78075.27
21	m	6	above_5_yrs_old	MATRAY_b	rural	112_311	aug	01/08/2016	345	0.3	213	0.24	632689.7	78082.11

21	m	6	above_5_yrs_old	MATRAY_b	rural	112_311	sep	11/09/2016	633	1.5	254	5.94	632660.8	78071.64
21	m	6	above_5_yrs_old	MATRAY_b	rural	112_311	oct	10/10/2016	628	1.5	283	8.07	632676.9	78074.04
22	m	14	above_5_yrs_old	MATRAY_c	rural	112_311	feb	06/02/2016	902	1.3	36	1.66	630342.3	70846.78
22	m	14	above_5_yrs_old	MATRAY_c	rural	112_311	mar	09/03/2016	730	2.5	68	1.77	630347.1	70843.96
22	m	14	above_5_yrs_old	MATRAY_c	rural	112_311	apr	07/04/2016	1201	5.3	97	2.13	630342.4	70849.08
22	m	14	above_5_yrs_old	MATRAY_c	rural	112_311	may	05/05/2016	456	2.5	125	3.60	630342.3	70846.16
22	m	14	above_5_yrs_old	MATRAY_c	rural	112_311	jun	10/06/2016	835	2.5	161	0.81	630340.4	70848.02
22	m	14	above_5_yrs_old	MATRAY_c	rural	112_311	sep	19/09/2016	1701	3	262	1.53	630342.7	70845.91
22	m	14	above_5_yrs_old	MATRAY_c	rural	112_311	oct	21/10/2016	1132	2.5	294	1.30	630337.3	70844.44
22	m	14	above_5_yrs_old	MATRAY_c	rural	112_311	nov	06/11/2016	955	1.3	310	1.54	630341.2	70849.68
23	f	NA	NA	MOUSTEY	suburban	112_311	jan	06/01/2016	82	2	5	2.53	585534.7	121844.1
23	f	NA	NA	MOUSTEY	suburban	112_311	feb	09/02/2016	193	2	39	1.36	585521.1	121849.6
23	f	NA	NA	MOUSTEY	suburban	112_311	mar	14/03/2016	100	1.8	73	0.91	585518.7	121841.6
23	f	NA	NA	MOUSTEY	suburban	112_311	apr	05/04/2016	234	2	95	1.73	585524.7	121845.5
23	f	NA	NA	MOUSTEY	suburban	112_311	may	16/05/2016	480	6	136	1.88	585518.6	121851.2
23	f	NA	NA	MOUSTEY	suburban	112_311	jun	06/06/2016	173	2	157	1.76	585522.6	121848.3
23	f	NA	NA	MOUSTEY	suburban	112_311	jul	04/07/2016	438	2	185	1.18	585513.9	121847.4
23	f	NA	NA	MOUSTEY	suburban	112_311	aug	22/08/2016	216	2	234	0.75	585517.1	121846.4
23	f	NA	NA	MOUSTEY	suburban	112_311	sep	14/09/2016	196	2	257	1.08	585522.4	121847.8
23	f	NA	NA	MOUSTEY	suburban	112_311	oct	12/10/2016	465	2.3	285	1.05	585521.2	121849.4
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	jan	09/01/2016	594	2.2	8	1.10	587238.8	122219.8
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	feb	06/02/2016	861	2	36	1.31	587242.1	122221.8
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	mar	11/03/2016	933	2	70	1.05	587241.8	122215.4
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	apr	10/04/2016	971	2	100	1.30	587242.4	122214.1
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	may	05/05/2016	1080	2	125	1.16	587241.3	122221.3
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	jun	09/06/2016	1050	2	160	1.82	587244.1	122214.9
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	jul	09/07/2016	1167	2	190	1.16	587247.6	122220.1
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	aug	28/08/2016	705	2	240	1.90	587242.8	122221.5
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	sep	18/09/2016	658	2	261	1.47	587243.1	122217.6
24	f	3	less_5_yrs_old	OZANNE	suburban	112_311	oct	15/10/2016	1103	2	288	1.14	587242.2	122217.7
25	f	2	less_5_yrs_old	PARMENTIER	rural	112_311	feb	06/02/2016	529	1.7	36	1.16	584843.1	93970.20
25	f	2	less_5_yrs_old	PARMENTIER	rural	112_311	mar	05/03/2016	935	9	64	1.23	584847.5	93970.58
25	f	2	less_5_yrs_old	PARMENTIER	rural	112_311	may	01/05/2016	1408	6.2	121	1.42	584844.8	93969.08
25	f	2	less_5_yrs_old	PARMENTIER	rural	112_311	aug	23/08/2016	1495	2	235	0.96	584834.6	93977.29
25	f	2	less_5_yrs_old	PARMENTIER	rural	112_311	sep	10/09/2016	1721	2	253	1.06	584839.1	93972.99
25	f	2	less_5_yrs_old	PARMENTIER	rural	112_311	oct	16/10/2016	705	2	289	1.13	584832.4	93974.24
26	f	6	above_5_yrs_old	PEIRAZEAU	urban	112_111	jan	09/01/2016	247	1.5	8	2.25	597519.8	123512.0
26	f	6	above_5_yrs_old	PEIRAZEAU	urban	112_111	feb	06/02/2016	265	1.3	36	2.37	597511.1	123509.4
26	f	6	above_5_yrs_old	PEIRAZEAU	urban	112_111	mar	19/03/2016	216	1.5	78	1.22	597506.8	123507.6
26	f	6	above_5_yrs_old	PEIRAZEAU	urban	112_111	apr	10/04/2016	566	2.5	100	4.82	597516.2	123538.8
26	f	6	above_5_yrs_old	PEIRAZEAU	urban	112_111	may	07/05/2016	702	1.3	127	3.76	597513.6	123515.3
26	f	6	above_5_yrs_old	PEIRAZEAU	urban	112_111	jun	19/06/2016	571	1.5	170	3.17	597503.1	123512.3
26	f	6	above_5_yrs_old	PEIRAZEAU	urban	112_111	sep	24/09/2016	976	1.2	267	3.81	597498.8	123496.7
27	f	NA	NA	PEYRICHOU	urban	112_114	feb	05/02/2016	375	2	35	0.93	608386.8	128136.6
27	f	NA	NA	PEYRICHOU	urban	112_114	mar	13/03/2016	631	2	72	1.19	608385.5	128130.3
27	f	NA	NA	PEYRICHOU	urban	112_114	apr	11/04/2016	710	2	101	1.19	608386.8	128131.1
27	f	NA	NA	PEYRICHOU	urban	112_114	may	18/05/2016	1026	2	138	1.01	608386.5	128134.8
27	f	NA	NA	PEYRICHOU	urban	112_114	jun	17/06/2016	544	2	168	0.86	608388.3	128135.3
27	f	NA	NA	PEYRICHOU	urban	112_114	aug	26/08/2016	1596	2	238	1.27	608384.9	128133.0
27	f	NA	NA	PEYRICHOU	urban	112_114	sep	19/09/2016	271	1	262	1.92	608412.2	128139.7
27	f	NA	NA	PEYRICHOU	urban	112_114	oct	15/10/2016	264	1.3	288	0.96	608383.1	128124.9
28	m	5	above_5_yrs_old	RICCI	urban	112_142	jan	16/01/2016	1091	1.5	15	0.60	614152.3	113743.1
28	m	5	above_5_yrs_old	RICCI	urban	112_142	feb	06/02/2016	682	2	36	0.96	614154.5	113743.7
28	m	5	above_5_yrs_old	RICCI	urban	112_142	mar	13/03/2016	1493	2	72	1.01	614151.2	113742.6
28	m	5	above_5_yrs_old	RICCI	urban	112_142	apr	09/04/2016	1613	2	99	0.91	614154.4	113743.7
28	m	5	above_5_yrs_old	RICCI	urban	112_142	may	07/05/2016	1371	1.5	127	0.62	614151.7	113744.4
28	m	5	above_5_yrs_old	RICCI	urban	112_142	jun	13/06/2016	1382	1.5	164	0.97	614149.8	113745.0
28	m	5	above_5_yrs_old	RICCI	urban	112_142	jul	15/07/2016	1235	2	196	1.10	614156.3	113743.8
28	m	5	above_5_yrs_old	RICCI	urban	112_142	aug	22/08/2016	1404	1.5	234	0.71	614156.1	113743.9
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	jan	05/01/2016	767	2	4	1.16	593286.1	124035.2
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	feb	13/02/2016	912	2	43	0.72	593286.3	124033.2
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	mar	12/03/2016	742	2	71	1.15	593285.8	124034.4
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	apr	15/04/2016	1302	2	105	0.66	593288.2	124031.3
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	may	06/05/2016	2251	2	126	0.46	593287.5	124033.8
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	jun	17/06/2016	2357	2	168	0.36	593290.1	124033.3
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	jul	15/07/2016	2497	2	196	0.50	593287.7	124038.0
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	aug	23/08/2016	2191	2	235	0.72	593287.9	124033.3
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	sep	15/09/2016	3257	15	258	0.42	593288.2	124033.7
29	m	3	less_5_yrs_old	RUSSIER	urban	112_111	oct	01/10/2016	1301	1	274	0.27	593287.8	124032.8
30	m	NA	NA	VERRET	rural	211_112	jan	08/01/2016	969	4	7	4.53	618037.8	106842.1
30	m	NA	NA	VERRET	rural	211_112	feb	10/02/2016	1330	1.4	40	4.02	618033.2	106863.5
30	m	NA	NA	VERRET	rural	211_112	mar	11/03/2016	942	2	70	79.66	618046.9	106851.3
30	m	NA	NA	VERRET	rural	211_112	apr	12/04/2016	1503	2.3	102	1.55	618034.9	106837.1
30	m	NA	NA	VERRET	rural	211_112	may	19/05/2016	456	1	139	2.04	618048.8	106865.1
30	m	NA	NA	VERRET	rural	211_112	jun	06/06/2016	2008	5.5	157	3.13	618040.1	106861.7
30	m	NA	NA	VERRET	rural	211_112	jul	13/07/2016	1444	2.4	194	3.3	618041.9	106848.7
30	m	NA	NA	VERRET	rural	211_112	aug	10/08/2016	1525	2.5	222	7.86	618063.0	106909.9
30	m	NA	NA	VERRET	rural	211_112	sep	10/09/2016	2066	3	253	5.03	618054.6	106888.9
30	m	NA	NA	VERRET	rural	211_112	oct	12/10/2016	948	2.5	285	2.95	618056.1	106900.5

Supplementary Figure S5

GAMMs were run using the *bam* function the *mgcv* package (v. 0.2-5 – Wood 2011). Graphical displays were performed using the *plot_smooth* function in the *itsadug* package (v. 2.3 - van Rij *et al.* 2017), and codes provided in Zuur *et al.* (2009; 2014).

Fig. S5a. Check of the Negative binomial error GAMM model with 184 monthly home ranges from n = 23 aged and sexed cats.

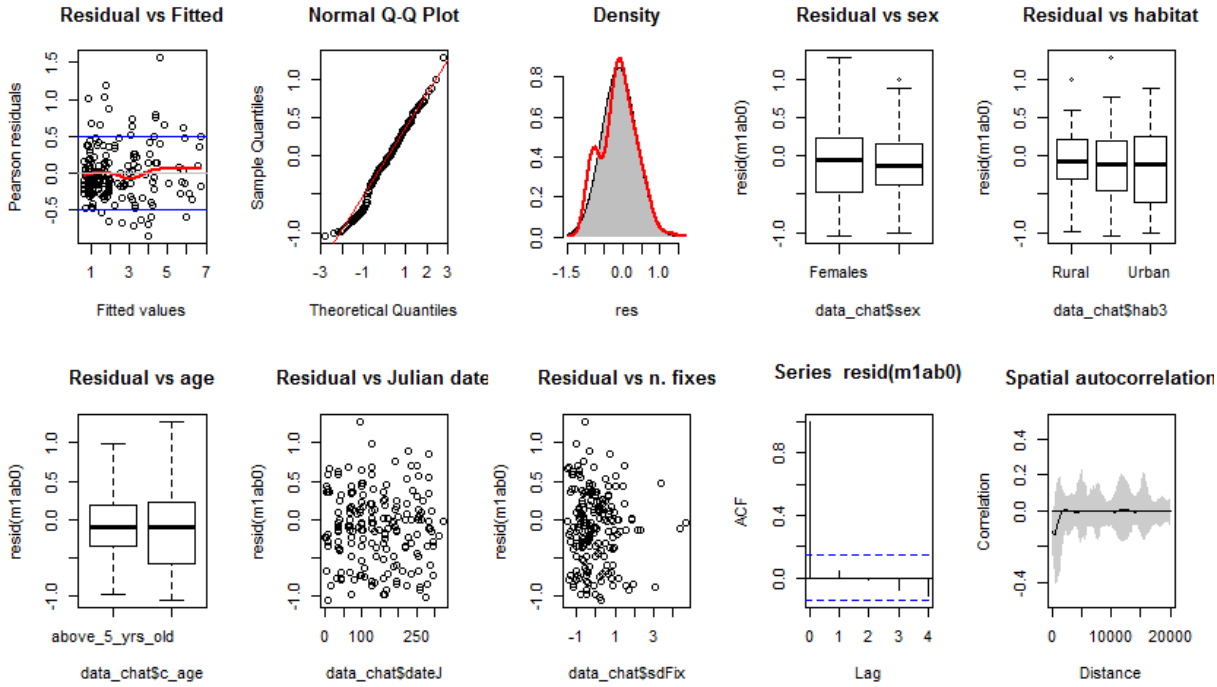
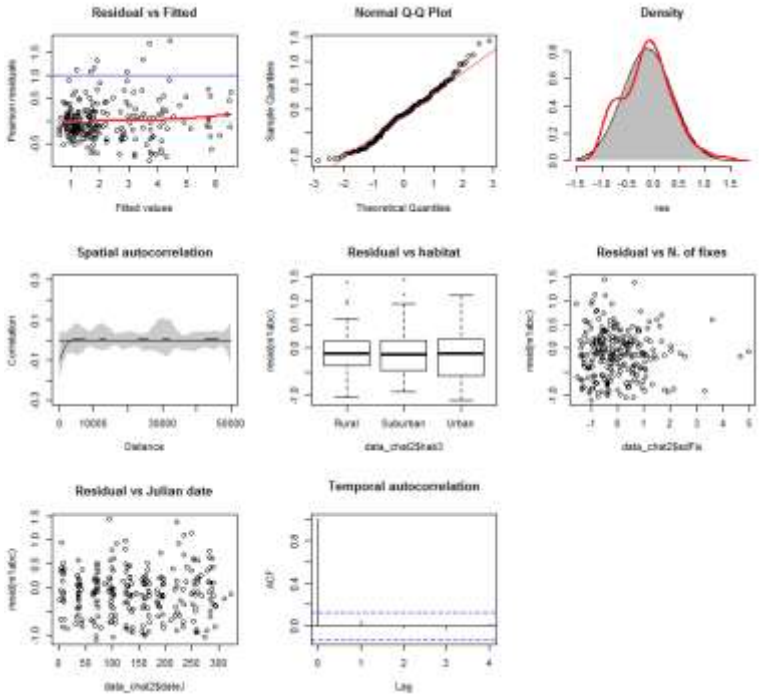


Fig. S5b. Check of the Negative binomial error GAMM model with 244 monthly home ranges from n = 30 neutered cats.



Wood SN. 2011 Fast stable restricted maximum likelihood and marginal likelihood estimation of semiparametric generalized linear models. *J. R. Statist. Soc.* B **73**, 3–36. (doi: 10.1111/j.1467-9868.2010.00749.x)
van Rij J, Wieling M, Baayen R and van Rijn H. 2017 itsadug: Interpreting Time Series and Autocorrelated Data Using GAMMs. R package version 2.3. (https://cran.r-project.org/web/packages/itsadug/index.html)
Zuur AF, Ieno EN, Walker N, Saveliev A, Smith GM. 2009 Mixed effects models and extensions in ecology with R. Springer New York. 978 pp.
Zuur AF, Saveliev AA, Ieno EN. 2014 Beginner's Guide to GAM and GAMM with R. Highland Statistics Limited. (http://highstat.com/index.php/beginner-s-guide-to-generalized-additive-mixed-models)

Cat 1

```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
       id   burst nb.reloc NAs          date.begin            date.end
1 cat1Apr cat1Apr      731   0 2016-04-08 15:04:33 2016-04-10 15:05:17
2 cat1Aug cat1Aug     1487   0 2016-08-11 06:51:22 2016-08-13 06:55:31
3 cat1Feb cat1Feb      574   0 2016-02-12 06:55:34 2016-02-14 06:43:11
4 cat1Jul cat1Jul     1576   0 2016-07-14 13:24:44 2016-07-16 08:13:29
5 cat1Jun cat1Jun      948   0 2016-06-11 05:29:22 2016-06-13 04:32:24
6 cat1Mar cat1Mar     1225   0 2016-03-11 07:47:27 2016-03-13 07:43:11
7 cat1May cat1May      897   0 2016-05-13 05:54:08 2016-05-15 06:44:03
8 cat1Oct cat1Oct      746   0 2016-10-07 06:57:41 2016-10-09 05:28:49
9 cat1Sep cat1Sep      678   0 2016-09-16 08:30:34 2016-09-18 08:39:02

> CAT1_TABLE1
       id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat1Apr  731 573158.0 135910.0       237       81        0.07
2 cat1Aug 1487 573156.3 135918.7       116       69        0.10
3 cat1Feb  574 573160.3 135908.4       300       72        0.05
4 cat1Jul 1576 573155.3 135915.7        98       80        0.12
5 cat1Jun  948 573155.5 135908.3       179      130        0.08
6 cat1Mar 1225 573160.8 135914.1       141       76        0.10
7 cat1May  897 573162.1 135909.2       196       76        0.08
8 cat1Oct  746 573161.6 135907.7       225      128        0.07
9 cat1Sep  678 573161.7 135913.6       256      107        0.06

> (MCP100CAT1df)
             x        y
1049  1.971962 48.92458
7702  1.971606 48.92229
4306  1.969904 48.92185
4383  1.969255 48.92277
4263  1.969175 48.92324
4732  1.969031 48.92431
1068  1.970343 48.92448
10491 1.971962 48.92458
```

Cat 2

```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
       id   burst nb.reloc NAs          date.begin            date.end
1 cat2Apr cat2Apr      614   0 2016-04-10 14:03:34 2016-04-12 15:48:00
2 cat2Aug cat2Aug     2181   0 2016-08-10 17:39:03 2016-08-12 16:56:17
3 cat2Jul cat2Jul      749   0 2016-07-08 08:35:27 2016-07-09 04:13:42
4 cat2Jun cat2Jun     1039   0 2016-06-15 15:38:33 2016-06-17 00:54:01
5 cat2Mar cat2Mar     1260   0 2016-03-15 07:10:15 2016-03-17 17:38:51
6 cat2May cat2May      451   0 2016-05-10 13:42:56 2016-05-11 20:05:08
7 cat2Oct cat2Oct      254   0 2016-10-20 05:40:41 2016-10-20 10:38:53
8 cat2Sep cat2Sep      500   0 2016-09-10 07:47:04 2016-09-11 09:29:59

> CAT2_TABLE1
       id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat2Apr  614 466938.5 186519.7       292      195       0.09
2 cat2Aug 2181 466963.9 186466.2        78      341       0.25
3 cat2Jul  749 466897.3 186521.0        95      208       0.30
4 cat2Jun 1039 466920.4 186519.7       115      178       0.20
5 cat2Mar 1260 466914.2 186523.9       167      360       0.15
6 cat2May  451 466942.3 186505.3       243      251       0.10
7 cat2Oct  254 466942.2 186489.8        71      111       0.29
8 cat2Sep  500 466966.3 186450.3       186      229       0.12

> (MCP100CAT2df)
             x        y
4643  0.507829 49.36556
716   0.507724 49.36303
6567  0.505667 49.36158
4574  0.502684 49.36165
2158  0.502139 49.36218
2301  0.501738 49.36481
3194  0.502038 49.36523
3751  0.502184 49.36541
3731  0.502260 49.36544
3753  0.502601 49.36560
3746  0.503133 49.36582
539   0.503718 49.36596
3232  0.504842 49.36615
46431 0.507829 49.36556
```

Cat 3

```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
  id   burst nb.reloc NAs          date.begin            date.end
1 cat3Apr cat3Apr      920   0 2016-04-07 17:05:33 2016-04-09 00:27:56
2 cat3Aug cat3Aug     1601   0 2016-08-10 17:25:52 2016-08-12 16:08:29
3 cat3Jul cat3Jul     2764   0 2016-07-14 08:11:46 2016-07-17 17:10:36
4 cat3Jun cat3Jun     1516   0 2016-06-09 08:26:35 2016-06-11 07:10:38
5 cat3Mar cat3Mar     1072   0 2016-03-09 17:31:57 2016-03-11 13:17:55
6 cat3May cat3May     1270   0 2016-05-08 13:10:21 2016-05-10 05:52:26
7 cat3Oct cat3Oct     1007   0 2016-10-11 17:44:12 2016-10-13 05:17:12
8 cat3Sep cat3Sep      956   0 2016-09-07 07:01:49 2016-09-09 06:46:38


> CAT3_TABLE1
id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat3Apr  920 467024.6 186455.2       123       287       0.19
2 cat3Aug 1601 467061.5 186418.9       105       222       0.18
3 cat3Jul 2764 467051.4 186422.5       106       117       0.15
4 cat3Jun 1516 467050.4 186428.5       111       220       0.17
5 cat3Mar 1072 467070.7 186428.2       147       121       0.14
6 cat3May 1270 467028.6 186427.8       115       315       0.16
7 cat3Oct 1007 467015.1 186558.3       127       194       0.16
8 cat3Sep  956 466992.1 186519.7       180       154       0.10

> (MCP100CAT3df)
              x        y
10420  0.507703 49.36452
1396   0.509605 49.36206
1401   0.510328 49.36088
1355   0.504444 49.36170
1803   0.502857 49.36207
1088   0.502322 49.36445
10942  0.502424 49.36606
10958  0.502571 49.36629
10955  0.502680 49.36633
9873   0.503172 49.36627
10216  0.505562 49.36562
10031  0.507186 49.36485
795    0.507426 49.36470
104201 0.507703 49.36452
```

Cat 4

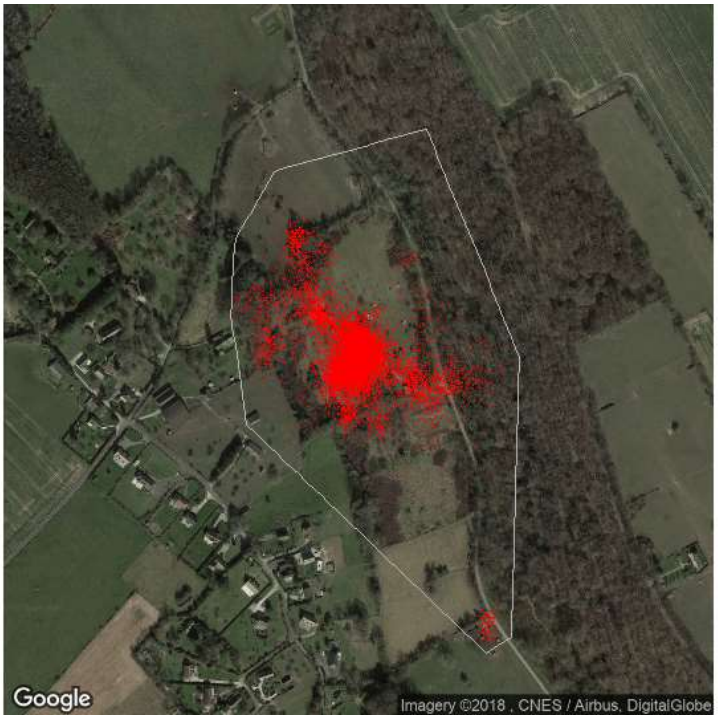
```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
  id   burst nb.reloc NAs          date.begin            date.end
1 cat4Apr cat4Apr     3454   0 2016-04-13 18:12:31 2016-04-17 19:47:02
2 cat4Aug cat4Aug     2416   0 2016-08-06 18:25:50 2016-08-09 19:04:20
3 cat4Jul cat4Jul      851   0 2016-07-14 09:13:35 2016-07-15 08:58:42
4 cat4Jun cat4Jun     1770   0 2016-06-15 19:03:34 2016-06-17 13:03:33
5 cat4Mar cat4Mar     1395   0 2016-03-27 10:01:33 2016-03-29 09:06:39
6 cat4May cat4May     2044   0 2016-05-14 08:53:10 2016-05-16 07:48:41
7 cat4Oct cat4Oct     1648   0 2016-10-17 09:24:20 2016-10-19 09:25:03
8 cat4Sep cat4Sep     1893   0 2016-09-11 07:10:26 2016-09-13 18:29:44

> CAT4_TABLE1
id    nb   X_mean    Y_mean mean_time max_dist mean_speed
1 cat4Apr 3454 460512.9 188358.2       102      371       0.21
2 cat4Aug 2416 460526.1 188363.9       108      155       0.13
3 cat4Jul  851 460522.6 188378.2       101      145       0.12
4 cat4Jun 1770 460532.7 188352.2        85      216       0.16
5 cat4Mar 1395 460512.4 188361.9       122      272       0.17
6 cat4May 2044 460517.2 188353.6        83      209       0.22
7 cat4Oct 1648 460495.7 188397.1       105      206       0.17
8 cat4Sep 1893 460520.1 188355.7       113      153       0.18

> MCP100CAT4df
             x        y
1759  0.417182 49.38005
2398  0.417649 49.37929
13242 0.417530 49.37655
13272 0.417148 49.37639
2512  0.413530 49.37863
580   0.413294 49.37972
14322 0.413329 49.38025
14321 0.413369 49.38046
7594  0.413955 49.38112
14163 0.416243 49.38154
17591 0.417182 49.38005
```



Cat 5

```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
  id   burst nb.reloc NAs          date.begin            date.end
1 cat5Apr cat5Apr     1171   0 2016-04-02 17:17:20 2016-04-04 15:55:42
2 cat5Feb cat5Feb      457   0 2016-02-05 22:05:39 2016-02-07 16:21:21
3 cat5Jan cat5Jan      282   0 2016-01-09 07:34:26 2016-01-10 23:24:11
4 cat5Jun cat5Jun      719   0 2016-06-11 22:48:51 2016-06-13 09:46:10
5 cat5Mar cat5Mar      358   0 2016-03-05 21:31:10 2016-03-08 05:03:17
6 cat5May cat5May      717   0 2016-05-14 16:31:52 2016-05-16 13:15:32

> CAT5_TABLE1
id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat5Apr 1171 603863.7 122884.2       144      144       0.10
2 cat5Feb  457 603867.1 122892.4       334      133       0.05
3 cat5Jan  282 603848.4 122881.3       510      115       0.05
4 cat5Jun  719 603864.8 122873.1       175      139       0.09
5 cat5Mar  358 603847.7 122885.4       560      172       0.04
6 cat5May  717 603853.0 122865.2       225      106       0.09

> MCP100CAT5df
             x        y
3349  2.390634 48.80690
2345  2.391010 48.80587
2344  2.389933 48.80524
1571  2.388360 48.80550
2311  2.387939 48.80608
3201  2.387912 48.80713
353   2.389057 48.80773
226   2.389603 48.80753
33491 2.390634 48.80690
```

Cat 6

```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
       id   burst nb.reloc NAs          date.begin            date.end
1 cat6Apr cat6Apr      929   0 2016-04-12 09:23:43 2016-04-14 12:19:13
2 cat6Feb cat6Feb     1345   0 2016-02-07 06:26:03 2016-02-09 10:57:49
3 cat6Jan cat6Jan      916   0 2016-01-07 10:12:22 2016-01-09 08:58:01
4 cat6Jul cat6Jul      741   0 2016-07-11 14:52:55 2016-07-13 16:34:06
5 cat6Jun cat6Jun     1107   0 2016-06-10 05:30:38 2016-06-12 14:44:39
6 cat6Mar cat6Mar     1447   0 2016-03-06 08:10:32 2016-03-08 09:53:23
7 cat6May cat6May     1296   0 2016-05-07 16:25:36 2016-05-09 19:11:18
8 cat6Oct cat6Oct     1194   0 2016-10-11 08:13:49 2016-10-14 05:47:19
9 cat6Sep cat6Sep     1411   0 2016-09-12 15:25:37 2016-09-14 15:56:12

> CAT6_TABLE1
       id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat6Apr  929 590831.9 99153.97       198       87       0.07
2 cat6Feb 1346 590813.6 99133.87       141      135       0.09
3 cat6Jan  916 590821.6 99133.73       184       67       0.07
4 cat6Jul  741 590841.3 99166.81       242      122       0.06
5 cat6Jun 1107 590846.7 99167.51       186      126       0.07
6 cat6Mar 1448 590818.7 99150.57       124      133       0.14
7 cat6May 1297 590833.9 99157.06       141      118       0.09
8 cat6Oct 1194 590828.0 99142.28       210      135       0.07
9 cat6Sep 1411 590821.5 99145.67       124      115       0.11

> MCP100CAT6df
             x        y
3349  2.390634 48.80690
2345  2.391010 48.80587
2344  2.389933 48.80524
1571  2.388360 48.80550
2311  2.387939 48.80608
3201  2.387912 48.80713
353   2.389057 48.80773
226   2.389603 48.80753
33491 2.390634 48.80690
```

Cat 7

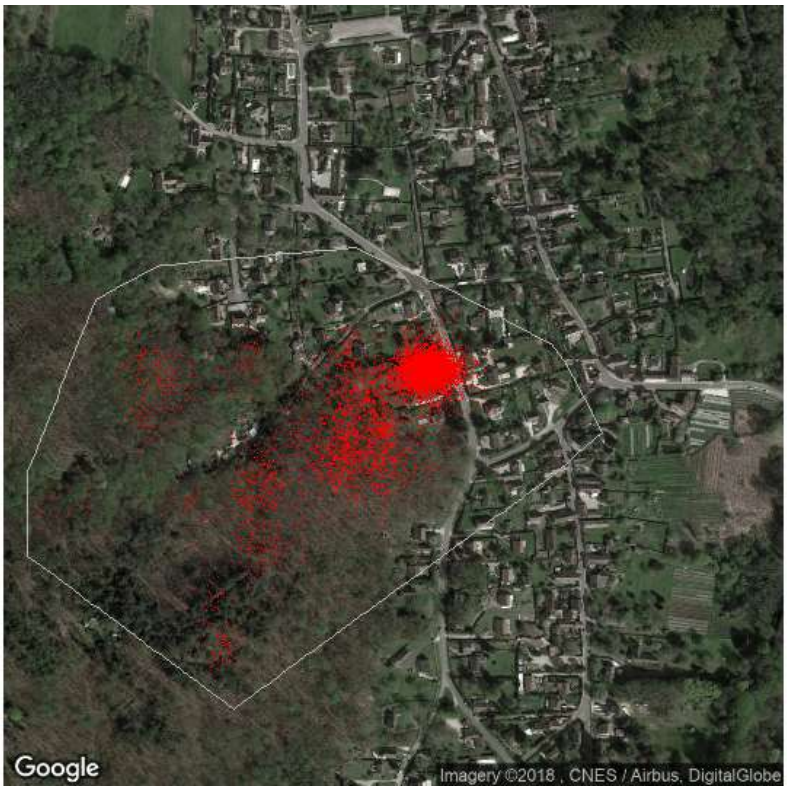
```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
       id   burst nb.reloc NAs          date.begin            date.end
1 cat7Apr cat7Apr     1081   0 2016-04-06 04:46:03 2016-04-08 03:56:12
2 cat7Aug cat7Aug     1667   0 2016-08-07 02:13:06 2016-08-09 05:44:12
3 cat7Feb cat7Feb      665   0 2016-02-05 06:01:57 2016-02-07 17:48:37
4 cat7Jan cat7Jan      491   0 2016-01-05 11:00:20 2016-01-07 10:45:23
5 cat7Jul cat7Jul     1540   0 2016-07-05 07:22:45 2016-07-07 07:13:55
6 cat7Jun cat7Jun     1301   0 2016-06-08 06:33:14 2016-06-10 05:59:03
7 cat7Mar cat7Mar      866   0 2016-03-15 05:52:27 2016-03-17 07:35:18
8 cat7May cat7May     1089   0 2016-05-06 06:05:33 2016-05-08 05:43:39
9 cat7Sep cat7Sep     1244   0 2016-09-08 05:27:57 2016-09-10 05:51:16

> CAT7_TABLE1
       id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat7Apr 1081 608876.7 80869.97       157      323       0.14
2 cat7Aug 1667 608907.4 80889.37       111      188       0.13
3 cat7Feb  665 608884.2 80872.39       324      221       0.08
4 cat7Jan  491 608875.4 80878.30       351      141       0.06
5 cat7Jul 1540 608897.1 80890.56       112      143       0.15
6 cat7Jun 1301 608883.8 80886.49       131      170       0.14
7 cat7Mar  866 608851.6 80835.83       207      153       0.12
8 cat7May 1089 608800.1 80837.15       158      125       0.17
9 cat7Sep 1244 608903.0 80884.68       140      309       0.13

> MCP100CAT7df
            x        y
629  2.458896 48.42888
650  2.459360 48.42828
882  2.458637 48.42786
2004 2.454299 48.42575
2045 2.451467 48.42715
2060 2.451466 48.42791
3928 2.452394 48.42948
3768 2.453282 48.42979
2853 2.455956 48.42996
7198 2.457147 48.42962
3482 2.458667 48.42908
6291 2.458896 48.42888
```



Cat 8

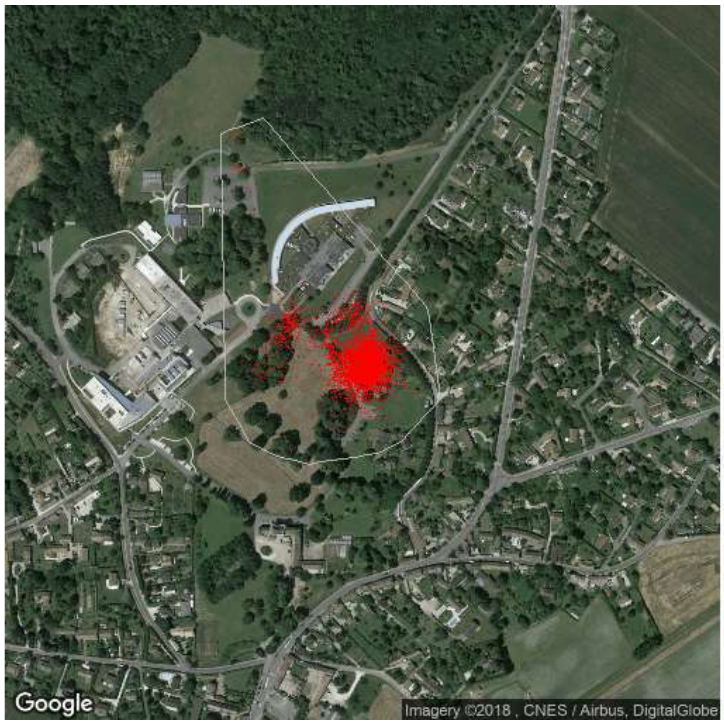
```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
       id   burst nb.reloc NAs          date.begin            date.end
1 cat8Apr cat8Apr     1138   0 2016-04-08 18:44:57 2016-04-10 18:27:03
2 cat8Feb cat8Feb     1126   0 2016-02-06 19:49:42 2016-02-08 19:02:34
3 cat8Jan cat8Jan     1095   0 2016-01-10 19:32:25 2016-01-12 19:47:08
4 cat8Jun cat8Jun      818   0 2016-06-15 16:06:35 2016-06-17 19:21:38
5 cat8Mar cat8Mar     1363   0 2016-03-09 20:02:51 2016-03-11 19:59:11
6 cat8May cat8May     1470   0 2016-05-14 20:55:01 2016-05-17 04:41:44

> CAT8_TABLE1
       id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat8Apr 1138 548717.4 125298.6       151       96       0.12
2 cat8Feb 1126 548718.8 125296.2       151      113       0.10
3 cat8Jan 1095 548719.5 125293.6       159       80       0.10
4 cat8Jun  818 548701.3 125309.2       226      153       0.08
5 cat8Mar 1363 548716.8 125297.2       127      201       0.14
6 cat8May 1470 548713.5 125295.1       137      262       0.12

> MCP100CAT8df
             x        y
1273  1.638990 48.82656
3021  1.639202 48.82565
2506  1.638620 48.82523
3583  1.638257 48.82511
4740  1.637225 48.82501
4745  1.637014 48.82504
4746  1.636726 48.82509
4747  1.636328 48.82522
4755  1.635964 48.82565
6251  1.635897 48.82827
6255  1.636187 48.82834
6257  1.636532 48.82843
12731 1.638990 48.82656
```



Cat 9

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
       id   burst nb.reloc NAs          date.begin            date.end
1 cat9Apr cat9Apr     1737   0 2016-04-13 19:42:48 2016-04-15 21:01:23
2 cat9Feb cat9Feb     1959   0 2016-02-01 20:10:39 2016-02-03 21:29:16
3 cat9Jan cat9Jan     1521   0 2016-01-05 20:48:16 2016-01-07 20:45:32
4 cat9Jul cat9Jul     1513   0 2016-07-12 19:06:04 2016-07-14 19:18:52
5 cat9Jun cat9Jun     1697   0 2016-06-07 17:56:15 2016-06-09 19:03:21
6 cat9Mar cat9Mar     1733   0 2016-03-06 18:27:03 2016-03-08 20:07:04
7 cat9May cat9May     1470   0 2016-05-17 20:45:31 2016-05-19 20:20:50
8 cat9Oct cat9Oct     1788   0 2016-10-12 17:13:04 2016-10-14 18:57:25
9 cat9Sep cat9Sep     1609   0 2016-09-07 18:04:34 2016-09-09 18:09:41

> CAT9_TABLE1
       id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat9Apr 1737 548726.7 125291.6       102      137       0.13
2 cat9Feb 1959 548726.6 125293.1        91       93       0.14
3 cat9Jan 1521 548725.0 125293.9       114      107       0.12
4 cat9Jul 1513 548724.7 125292.0       115      111       0.11
5 cat9Jun 1697 548723.8 125292.3       104      139       0.12
6 cat9Mar 1733 548726.7 125293.6       103      118       0.13
7 cat9May 1470 548723.9 125293.0       117      132       0.12
8 cat9Oct 1788 548726.4 125293.3       100      139       0.13
9 cat9Sep 1609 548722.5 125295.3       108      140       0.11

> MCP100CAT9df
             x        y
4483  1.639299 48.82619
5911  1.639464 48.82512
5915  1.639448 48.82504
12352 1.636999 48.82500
7198  1.636659 48.82508
9     1.636710 48.82621
12498 1.636816 48.82675
14915 1.637701 48.82758
44831 1.639299 48.82619
```

Cat 10

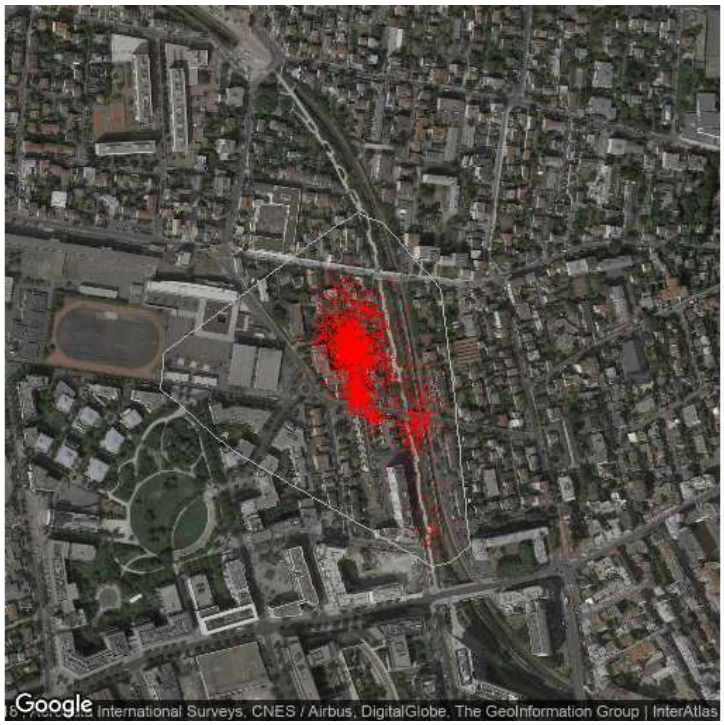
```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat10Apr cat10Apr      697   0 2016-04-16 06:06:39 2016-04-18 04:34:37
2 cat10Aug cat10Aug      801   0 2016-08-23 17:42:19 2016-08-25 17:43:54
3 cat10Feb cat10Feb      703   0 2016-02-12 18:25:31 2016-02-14 17:54:13
4 cat10Jul cat10Jul      849   0 2016-07-09 06:53:17 2016-07-11 19:43:10
5 cat10Jun cat10Jun      362   0 2016-06-16 08:13:53 2016-06-17 21:16:57
6 cat10Mar cat10Mar      453   0 2016-03-11 21:31:30 2016-03-13 19:08:56
7 cat10May cat10May      596   0 2016-05-18 18:54:24 2016-05-20 18:34:07
8 cat10Oct cat10Oct      998   0 2016-10-15 14:58:27 2016-10-19 05:19:51
9 cat10Sep cat10Sep      500   0 2016-09-17 14:22:46 2016-09-19 16:16:55

> CAT10_TABLE1
        id  nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat10Apr 697 594600.4 134356.0       240       73       0.06
2 cat10Aug 801 594614.9 134303.3       216      175       0.09
3 cat10Feb 703 594592.1 134379.5       243      140       0.09
4 cat10Jul 849 594605.9 134323.2       258       75       0.05
5 cat10Jun 362 594626.2 134315.1       369       97       0.04
6 cat10Mar 453 594597.2 134351.2       363       71       0.04
7 cat10May 596 594595.3 134351.7       288       78       0.05
8 cat10Oct 998 594610.1 134331.0       312      286       0.06
9 cat10Sep 500 594607.1 134337.0       360      158       0.05

> MCP100CAT10df
           x        y
559  2.264082 48.91016
2619 2.264277 48.90920
4354 2.264527 48.90763
3763 2.264235 48.90747
4379 2.263991 48.90741
5019 2.260954 48.90857
3886 2.259892 48.90917
3887 2.259933 48.90952
637  2.262368 48.91071
532  2.262852 48.91090
4569 2.263219 48.91081
5591 2.264082 48.91016
```



Cat 11

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat11Apr cat11Apr     1812   0 2016-04-05 22:34:40 2016-04-07 21:27:31
2 cat11Feb cat11Feb     1923   0 2016-02-08 12:48:52 2016-02-10 15:19:44
3 cat11Jun cat11Jun     1909   0 2016-06-11 10:36:56 2016-06-13 11:18:06
4 cat11Mar cat11Mar     2154   0 2016-03-13 10:03:36 2016-03-15 11:03:57
5 cat11May cat11May     1805   0 2016-05-18 18:50:32 2016-05-20 19:57:54

> CAT11_TABLE1
        id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat11Apr 1812 577105.8 137797.5        93      176       0.14
2 cat11Feb 1923 577088.6 137815.4        95      196       0.14
3 cat11Jun 1909 577084.0 137804.2        92       94       0.13
4 cat11Mar 2154 577118.9 137796.7        82      140       0.15
5 cat11May 1805 577086.6 137826.9        98      117       0.13

> MCP100CAT11df
             x        y
3957  2.027538 48.93958
1953  2.026148 48.93856
5365  2.025711 48.93825
5363  2.025507 48.93818
9151  2.023888 48.93858
6897  2.023305 48.93879
9160  2.022817 48.93910
9189  2.022437 48.93942
9219  2.022108 48.94033
9223  2.021999 48.94115
1707  2.023332 48.94120
1001  2.025362 48.94105
3951  2.027073 48.93992
39571 2.027538 48.93958
```

Cat 12

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat12Apr cat12Apr     2647   0 2016-04-10 17:26:25 2016-04-13 09:18:55
2 cat12Aug cat12Aug     1988   0 2016-08-21 17:48:30 2016-08-23 20:17:36
3 cat12Feb cat12Feb     1816   0 2016-02-06 16:27:25 2016-02-08 17:49:54
4 cat12Jan cat12Jan     1852   0 2016-01-06 13:41:32 2016-01-08 20:45:39
5 cat12Jul cat12Jul     1636   0 2016-07-13 16:01:25 2016-07-15 21:55:02
6 cat12Jun cat12Jun     1288   0 2016-06-09 05:56:57 2016-06-10 17:40:14
7 cat12Mar cat12Mar     2251   0 2016-03-06 18:10:40 2016-03-08 20:35:22
8 cat12May cat12May     2423   0 2016-05-08 15:52:58 2016-05-11 06:06:41


> CAT12_TABLE1
        id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat12Apr 2647 608564.3 105705.5        87       91       0.13
2 cat12Aug 1988 608555.0 105691.8        91      143       0.14
3 cat12Feb 1816 608564.7 105709.6        98      164       0.12
4 cat12Jan 1852 608565.5 105707.5       107      353       0.11
5 cat12Jul 1636 608559.7 105697.0       119       83       0.10
6 cat12Jun 1288 608555.8 105701.6       100      111       0.12
7 cat12Mar 2251 608563.8 105705.5        81      153       0.14
8 cat12May 2423 608562.9 105698.0        92      122       0.13

> MCP100CAT12df
              x        y
11097  2.454013 48.65168
265    2.454042 48.65070
264    2.453657 48.64870
12390  2.451489 48.65142
13682  2.451461 48.65149
4164   2.451541 48.65234
10641  2.452700 48.65293
4690   2.453619 48.65305
110971 2.454013 48.65168
```

Cat 13

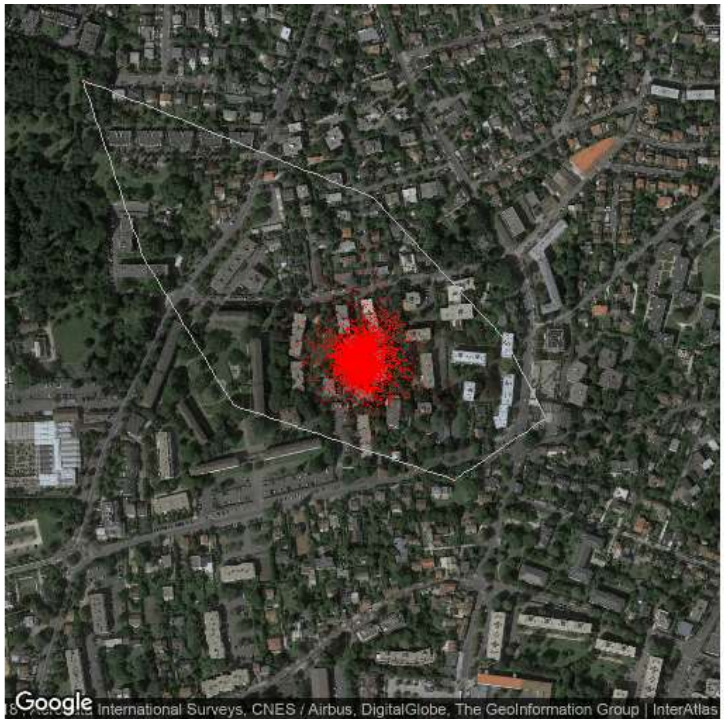
```
********** List of class ltraj **********

  Type of the traject: Type II (time recorded)
* Time zone: GMT *
  Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
         id    burst nb.reloc NAs          date.begin            date.end
1  cat13Apr cat13Apr      925   0 2016-04-08 23:40:43 2016-04-11 04:09:21
2  cat13Aug cat13Aug      952   0 2016-08-13 18:14:29 2016-08-15 20:41:20
3  cat13Feb cat13Feb      337   0 2016-02-06 08:42:21 2016-02-08 05:43:19
4  cat13Jan cat13Jan      902   0 2016-01-02 04:09:06 2016-01-10 19:17:31
5  cat13Jul cat13Jul      753   0 2016-07-16 06:35:30 2016-07-17 18:24:43
6  cat13Jun cat13Jun      977   0 2016-06-18 03:23:54 2016-06-20 04:35:52
7  cat13Mar cat13Mar      761   0 2016-03-12 04:44:26 2016-03-14 05:11:32
8  cat13May cat13May      562   0 2016-05-14 21:28:01 2016-05-17 03:55:38
9  cat13Nov cat13Nov      196   0 2016-11-19 07:09:34 2016-11-20 18:19:18
10 cat13Oct cat13Oct      283   0 2016-10-22 06:52:05 2016-10-24 03:28:17
11 cat13Sep cat13Sep      397   0 2016-09-17 07:33:33 2016-09-18 15:30:35

> CAT13_TABLE1
         id  nb   X_mean   Y_mean mean_time max_dist mean_speed
1  cat13Apr 925 595742.9 119079.6       204       99       0.09
2  cat13Aug 952 595740.0 119079.7       191      437       0.10
3  cat13Feb 337 595744.1 119072.5       482      202       0.05
4  cat13Jan 902 595742.2 119079.2       828      181       0.02
5  cat13Jul 753 595737.1 119073.6       171      277       0.11
6  cat13Jun 977 595739.1 119076.5       181      222       0.10
7  cat13Mar 761 595744.1 119072.4       230      124       0.08
8  cat13May 562 595737.5 119074.4       349      108       0.05
9  cat13Nov 196 595735.9 119068.2       649      109       0.03
10 cat13Oct 283 595734.3 119073.8       569       90       0.03
11 cat13Sep 397 595736.6 119073.3       290       74       0.06

> MCP100CAT13df
             x        y
1028  2.278713 48.77381
5516  2.280722 48.77239
4342  2.281309 48.77163
5546  2.279936 48.77102
701   2.276619 48.77176
4672  2.275261 48.77324
5329  2.274369 48.77496
5328  2.274538 48.77493
10281 2.278713 48.77381
```



Cat 14

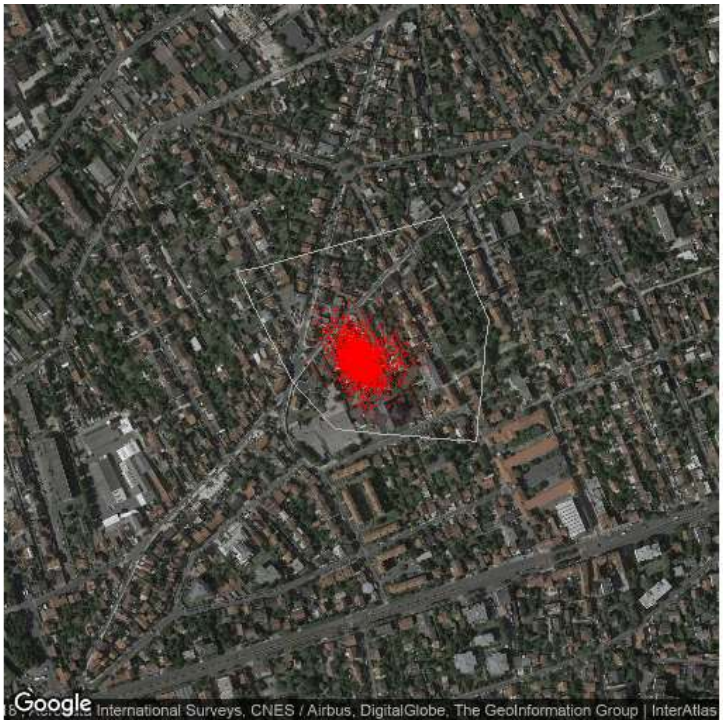
```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
         id    burst nb.reloc NAs          date.begin            date.end
1  cat14Apr cat14Apr      556   0 2016-04-06 09:55:33 2016-04-08 03:57:49
2  cat14Aug cat14Aug     1774   0 2016-08-10 17:34:26 2016-08-13 07:02:20
3  cat14Feb cat14Feb      400   0 2016-02-08 07:14:36 2016-02-10 05:22:20
4  cat14Jan cat14Jan      314   0 2016-01-10 09:01:31 2016-01-12 10:26:07
5  cat14Jul cat14Jul      953   0 2016-07-05 06:06:30 2016-07-06 18:15:16
6  cat14Jun cat14Jun     1161   0 2016-06-08 04:53:33 2016-06-10 17:58:15
7  cat14Mar cat14Mar      577   0 2016-03-07 06:13:18 2016-03-08 18:37:14
8  cat14May cat14May      799   0 2016-05-10 06:05:56 2016-05-12 05:02:52
9  cat14Oct cat14Oct     1669   0 2016-10-10 05:28:53 2016-10-12 05:46:15
10 cat14Sep cat14Sep      838   0 2016-09-15 04:53:24 2016-09-18 06:27:18

> CAT14_TABLE1
         id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1  cat14Apr  556 612026.1 128040.6       273       59       0.05
2  cat14Aug 1774 612028.3 128035.5       125       80       0.09
3  cat14Feb  400 612032.2 128034.5       416      117       0.04
4  cat14Jan  314 612033.4 128034.1       568      165       0.03
5  cat14Jul  953 612027.7 128039.8       137      186       0.10
6  cat14Jun 1161 612028.2 128038.3       190       61       0.06
7  cat14Mar  577 612030.5 128035.3       227      162       0.07
8  cat14May  799 612021.7 128047.5       212       93       0.08
9  cat14Oct 1669 612039.7 128038.6       104      193       0.19
10 cat14Sep  838 612028.1 128036.7       316       66       0.04

> MCP100CAT14df
             x        y
1254  2.502355 48.85310
4571  2.502170 48.85190
7867  2.500644 48.85198
8933  2.500068 48.85202
2513  2.499423 48.85248
56    2.498587 48.85356
7896  2.501696 48.85412
12541 2.502355 48.85310
```



Cat 15

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat15Apr cat15Apr      846   0 2016-04-08 21:13:14 2016-04-12 23:00:46
2 cat15Dec cat15Dec      272   0 2015-12-01 12:05:31 2015-12-04 11:26:05
3 cat15Feb cat15Feb      361   0 2016-02-03 11:50:55 2016-02-06 13:07:22
4 cat15Jan cat15Jan      185   0 2016-01-11 00:09:38 2016-01-16 13:57:34
5 cat15Jun cat15Jun     1590   0 2016-06-19 19:05:58 2016-06-23 12:53:28
6 cat15Mar cat15Mar      200   0 2016-03-02 10:58:19 2016-03-04 16:16:04

> CAT15_TABLE1
        id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat15Apr  846 594537.1 122805.5       417       72       0.03
2 cat15Dec  272 594530.8 122801.1       948       64       0.02
3 cat15Feb  361 594534.4 122804.7       733       82       0.02
4 cat15Jan  185 594534.5 122798.7      2618       67       0.01
5 cat15Jun 1590 594529.5 122794.3       203      105       0.07
6 cat15Mar  200 594539.5 122812.1       964       66       0.01

> MCP100CAT15df
             x        y
2767  2.263032 48.80602
3169  2.262704 48.80528
2996  2.262130 48.80484
710   2.261420 48.80526
781   2.261324 48.80562
488   2.261762 48.80635
341   2.262194 48.80626
27671 2.263032 48.80602
```

Cat 16

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
         id    burst nb.reloc NAs          date.begin            date.end
1  cat16Apr cat16Apr     1359   0 2016-04-09 11:00:15 2016-04-11 16:24:31
2  cat16Aug cat16Aug      818   0 2016-08-15 10:18:04 2016-08-17 11:29:08
3  cat16Feb cat16Feb      891   0 2016-02-07 14:30:31 2016-02-09 17:40:50
4  cat16Jan cat16Jan     1273   0 2016-01-10 10:07:26 2016-01-12 20:08:33
5  cat16Jul cat16Jul     1412   0 2016-07-14 11:42:27 2016-07-16 17:03:05
6  cat16Jun cat16Jun      622   0 2016-06-18 16:51:31 2016-06-19 17:11:59
7  cat16Mar cat16Mar     1224   0 2016-03-13 12:42:28 2016-03-15 17:39:46
8  cat16May cat16May     1470   0 2016-05-12 17:20:28 2016-05-14 19:21:26
9  cat16Oct cat16Oct     1008   0 2016-10-16 19:57:33 2016-10-18 18:38:44
10 cat16Sep cat16Sep     1155   0 2016-09-26 16:11:21 2016-09-28 17:44:46

> CAT16_TABLE1
         id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1  cat16Apr 1359 609389.7 128342.3       142      159       0.11
2  cat16Aug  818 609392.4 128348.8       217       70       0.07
3  cat16Feb  891 609390.1 128344.8       207      214       0.08
4  cat16Jan 1273 609386.3 128336.2       164      186       0.09
5  cat16Jul 1412 609390.2 128350.7       136      128       0.11
6  cat16Jun  622 609395.5 128348.6       141      103       0.10
7  cat16Mar 1224 609390.2 128337.1       156       84       0.10
8  cat16May 1470 609394.5 128345.1       123      104       0.12
9  cat16Oct 1008 609392.1 128347.5       167      257       0.10
10 cat16Sep 1155 609387.3 128343.4       155       80       0.10

> MCP100CAT16df
             x        y
4857  2.465677 48.85614
4500  2.465159 48.85453
527   2.462779 48.85430
10630 2.461261 48.85457
10472 2.463317 48.85612
4267  2.464866 48.85669
48571 2.465677 48.85614
```

Cat 17

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
         id    burst nb.reloc NAs          date.begin            date.end
1  cat17Apr cat17Apr      781   0 2016-04-05 16:34:59 2016-04-08 05:00:11
2  cat17Aug cat17Aug      492   0 2016-08-06 12:51:06 2016-08-08 09:57:07
3  cat17Feb cat17Feb      689   0 2016-02-08 11:47:59 2016-02-10 11:12:18
4  cat17Jan cat17Jan     1345   0 2016-01-07 18:36:23 2016-01-13 09:59:38
5  cat17Jul cat17Jul      457   0 2016-07-07 16:50:44 2016-07-10 05:38:56
6  cat17Jun cat17Jun      703   0 2016-06-06 20:33:03 2016-06-08 17:55:22
7  cat17Mar cat17Mar      839   0 2016-03-10 07:06:56 2016-03-12 06:54:20
8  cat17May cat17May      581   0 2016-05-05 16:21:40 2016-05-07 05:24:31
9  cat17Oct cat17Oct      388   0 2016-10-05 12:57:51 2016-10-07 08:55:47
10 cat17Sep cat17Sep      532   0 2016-09-07 20:17:42 2016-09-10 10:41:12

> CAT17_TABLE1
         id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1  cat17Apr  781 592601.3 122783.9       279      466       0.07
2  cat17Aug  492 592661.5 122829.6       331      261       0.06
3  cat17Feb  689 592678.5 122842.1       248      158       0.08
4  cat17Jan 1345 592695.9 122841.2       363      134       0.05
5  cat17Jul  457 592682.5 122834.2       480      181       0.04
6  cat17Jun  703 592670.3 122836.6       233      303       0.09
7  cat17Mar  839 592668.2 122834.5       205      293       0.10
8  cat17May  581 592660.9 122826.9       230      275       0.11
9  cat17Oct  388 592666.1 122831.3       409      108       0.05
10 cat17Sep  532 592660.5 122825.9       423      310       0.06

> MCP100CAT17df
             x        y
4446  2.239859 48.80648
2274  2.240723 48.80491
3674  2.240084 48.80459
3687  2.235970 48.80340
3686  2.235738 48.80335
3008  2.232742 48.80296
3034  2.232369 48.80292
3046  2.231158 48.80298
3044  2.230390 48.80332
3042  2.230380 48.80334
3562  2.230280 48.80404
3050  2.230518 48.80430
3076  2.233456 48.80683
1897  2.235323 48.80832
1889  2.235570 48.80845
6036  2.238488 48.80868
44461 2.239859 48.80648
```

Cat 18

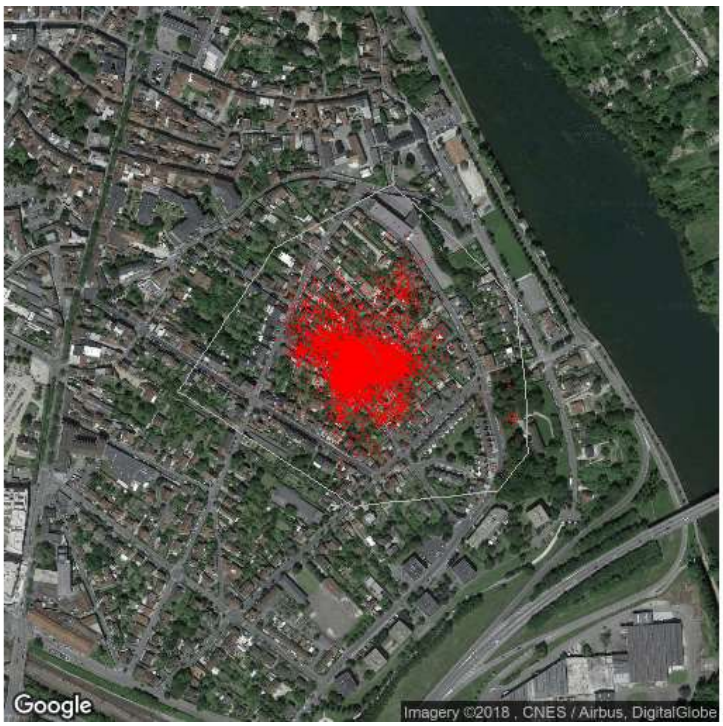
```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat18Apr cat18Apr     1636   0 2016-04-12 04:38:29 2016-04-14 15:04:33
2 cat18Aug cat18Aug     1783   0 2016-08-16 03:33:36 2016-08-18 14:34:58
3 cat18Feb cat18Feb     1170   0 2016-02-14 08:48:06 2016-02-16 16:48:33
4 cat18Jan cat18Jan     1137   0 2016-01-12 06:23:11 2016-01-13 19:32:47
5 cat18Jul cat18Jul     4347   0 2016-07-03 09:56:33 2016-07-20 17:31:42
6 cat18Mar cat18Mar      975   0 2016-03-14 13:15:11 2016-03-16 15:58:56
7 cat18Oct cat18Oct     1767   0 2016-10-10 03:17:22 2016-10-12 16:26:26
8 cat18Sep cat18Sep     1171   0 2016-09-13 05:29:53 2016-09-14 19:29:01

> CAT18_TABLE1
        id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat18Apr 1636 554997.9 143045.6       129      238       0.14
2 cat18Aug 1783 554986.6 143032.0       119       96       0.11
3 cat18Feb 1170 555003.7 143054.3       172      101       0.08
4 cat18Jan 1137 555013.9 143042.8       118      176       0.16
5 cat18Jul 4347 555000.6 143028.6       344      196       0.03
6 cat18Mar  975 555008.6 143033.4       188      104       0.08
7 cat18Oct 1767 554997.7 143028.9       125      159       0.09
8 cat18Sep 1171 554985.5 143038.7       117       75       0.11

> MCP100CAT18df
             x        y
6027  1.723931 48.98664
2017  1.724111 48.98561
2005  1.724118 48.98513
2002  1.723673 48.98476
1107  1.721510 48.98461
12894 1.718877 48.98574
3851  1.720311 48.98714
4403  1.722070 48.98777
669   1.723162 48.98715
60271 1.723931 48.98664
```



Cat 19

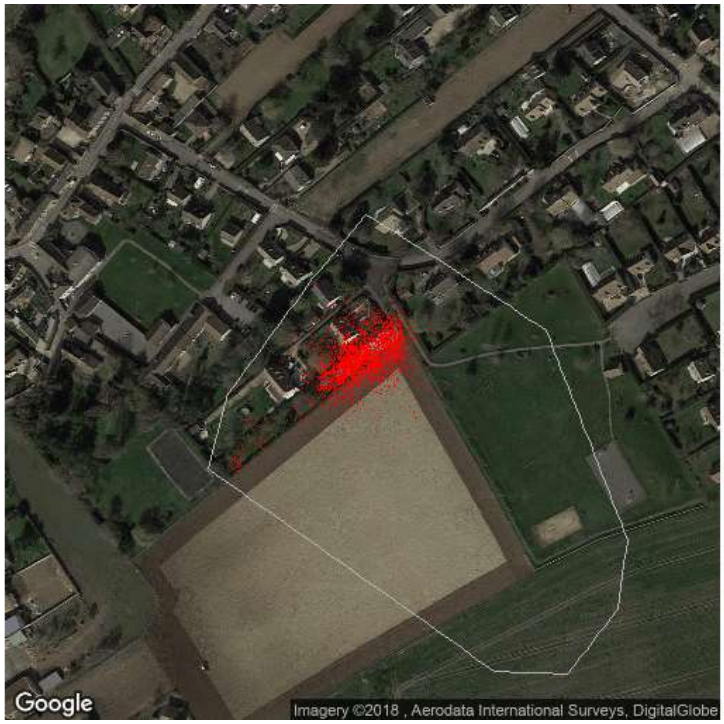
```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat19Apr cat19Apr      773   0 2016-04-16 06:54:27 2016-04-18 07:02:01
2 cat19Feb cat19Feb      502   0 2016-02-13 16:37:06 2016-02-15 16:02:41
3 cat19Jan cat19Jan      398   0 2016-01-09 05:05:02 2016-01-10 13:57:02
4 cat19Mar cat19Mar      612   0 2016-03-11 22:26:33 2016-03-13 18:07:00
5 cat19May cat19May      759   0 2016-05-07 06:30:08 2016-05-09 05:26:50

> CAT19_TABLE1
        id  nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat19Apr 773 562542.8 131056.2       224       82       0.06
2 cat19Feb 502 562539.4 131054.3       341      101       0.04
3 cat19Jan 398 562538.3 131050.2       298      171       0.05
4 cat19Mar 612 562541.3 131054.8       257       58       0.05
5 cat19May 759 562542.1 131052.5       223       81       0.04

> MCP100CAT19df
            x        y
783  1.827163 48.87893
119  1.827774 48.87790
121  1.827699 48.87755
122  1.827326 48.87724
124  1.826777 48.87725
1599 1.824634 48.87825
2934 1.824781 48.87862
2254 1.825415 48.87919
2527 1.825813 48.87950
1645 1.826087 48.87939
7831 1.827163 48.87893
```



Cat 20

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat20Apr cat20Apr      435   0 2016-04-18 07:52:36 2016-04-18 20:50:22
2 cat20Aug cat20Aug     1343   0 2016-08-03 06:38:56 2016-08-05 12:28:14
3 cat20Jul cat20Jul     1572   0 2016-07-05 06:36:14 2016-07-07 18:09:31
4 cat20Jun cat20Jun     1654   0 2016-06-07 18:16:35 2016-06-10 18:51:47
5 cat20Mar cat20Mar      355   0 2016-03-15 21:41:16 2016-03-17 20:48:39
6 cat20May cat20May      228   0 2016-05-14 14:55:31 2016-05-14 20:00:34
7 cat20Oct cat20Oct      737   0 2016-10-08 20:56:19 2016-10-10 20:33:20
8 cat20Sep cat20Sep     1670   0 2016-09-13 18:14:33 2016-09-16 05:20:59

> CAT20_TABLE1
        id   nb    X_mean   Y_mean mean_time max_dist mean_speed
1 cat20Apr  435 630424.6 69146.08       108      353       0.24
2 cat20Aug 1343 630420.8 69125.30       144      296       0.13
3 cat20Jul 1572 630416.1 69127.53       136      222       0.10
4 cat20Jun 1654 630407.9 69126.38       158      231       0.10
5 cat20Mar  355 630407.4 69136.78       479      193       0.04
6 cat20May  228 630400.2 69159.53        81      221       0.34
7 cat20Oct  737 630405.6 69136.82       233      273       0.07
8 cat20Sep 1670 630418.0 69123.50       127      254       0.13

> MCP100CAT20df
             x        y
5934  2.749091 48.32348
1527  2.748727 48.32220
1529  2.747187 48.31952
8827  2.744181 48.32063
5522  2.743169 48.32353
4014  2.746726 48.32458
7883  2.748382 48.32412
59341 2.749091 48.32348
```

Cat 21

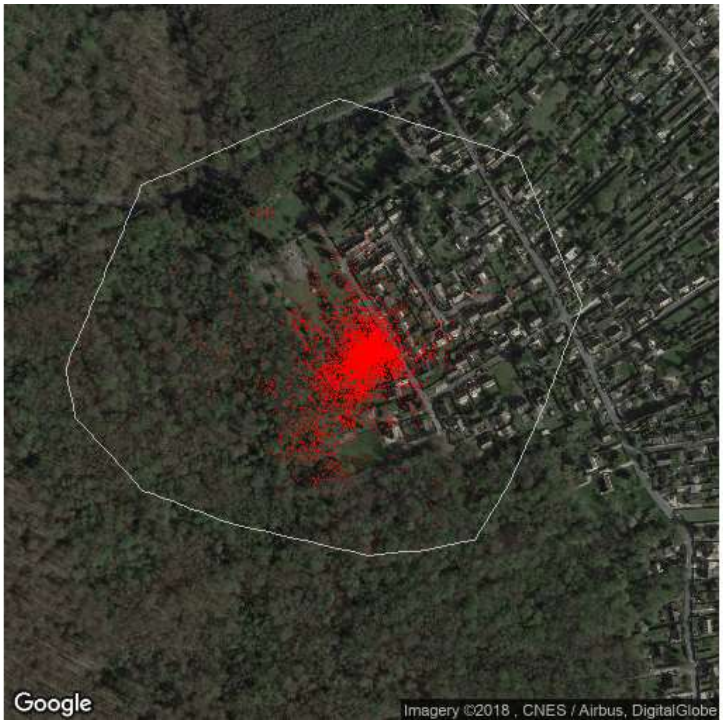
```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat21Apr cat21Apr      970   0 2016-04-12 05:57:46 2016-04-14 12:59:54
2 cat21Aug cat21Aug      345   0 2016-08-01 10:49:15 2016-08-01 16:49:51
3 cat21Jul cat21Jul      831   0 2016-07-29 08:13:01 2016-07-31 21:40:19
4 cat21Jun cat21Jun     4136   0 2016-06-20 11:47:31 2016-06-27 10:37:10
5 cat21Mar cat21Mar      921   0 2016-03-12 15:16:04 2016-03-14 15:51:46
6 cat21May cat21May      570   0 2016-05-25 13:00:33 2016-05-27 17:57:52
7 cat21Oct cat21Oct      628   0 2016-10-10 05:31:39 2016-10-11 19:28:10
8 cat21Sep cat21Sep      633   0 2016-09-11 07:32:33 2016-09-12 19:23:36

> CAT21_TABLE1
        id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat21Apr  970 632682.1 78077.06       204      322       0.13
2 cat21Aug  345 632689.7 78082.11        63       30       0.05
3 cat21Jul  831 632680.3 78075.27       267      159       0.08
4 cat21Jun 4136 632683.8 78080.20       145      216       0.06
5 cat21Mar  921 632691.3 78097.30       190      287       0.13
6 cat21May  570 632662.2 78077.29       335      266       0.07
7 cat21Oct  628 632676.9 78074.04       218      184       0.10
8 cat21Sep  633 632660.8 78071.64       204      287       0.11

> MCP100CAT21df
            x        y
291  2.781181 48.40325
2149 2.780595 48.40221
2708 2.780084 48.40146
1295 2.779576 48.40092
400  2.778855 48.40082
9060 2.777989 48.40076
2396 2.775928 48.40108
8151 2.774601 48.40141
8850 2.773578 48.40214
8846 2.773450 48.40260
8843 2.773465 48.40267
1794 2.774578 48.40444
279  2.777375 48.40526
551  2.777558 48.40530
629  2.779416 48.40490
44   2.780234 48.40472
2911 2.781181 48.40325
```



Cat 22

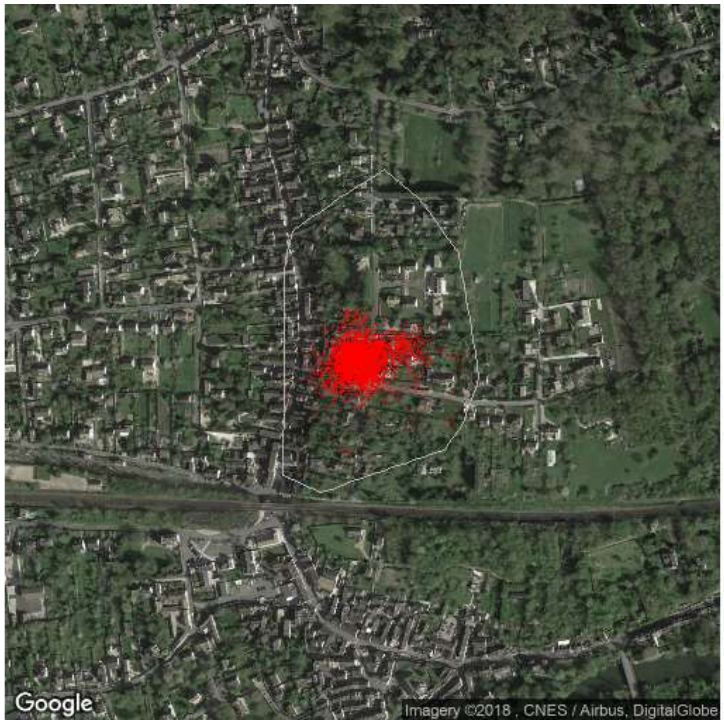
```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat22Apr cat22Apr     1201   0 2016-04-07 07:38:06 2016-04-09 15:44:20
2 cat22Feb cat22Feb      902   0 2016-02-06 14:18:32 2016-02-08 21:51:50
3 cat22Jun cat22Jun      835   0 2016-06-10 18:45:45 2016-06-13 05:57:05
4 cat22Mar cat22Mar      730   0 2016-03-09 07:03:34 2016-03-11 17:59:29
5 cat22May cat22May      456   0 2016-05-05 19:10:38 2016-05-07 10:37:54
6 cat22Nov cat22Nov      955   0 2016-11-06 08:39:49 2016-11-08 16:41:00
7 cat22Oct cat22Oct     1132   0 2016-10-21 07:25:22 2016-10-23 18:40:37
8 cat22Sep cat22Sep     1701   0 2016-09-19 10:48:59 2016-09-22 07:39:31

> CAT22_TABLE1
        id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat22Apr 1201 630342.4 70849.08       168      169       0.11
2 cat22Feb  902 630342.3 70846.78       222      148       0.08
3 cat22Jun  835 630340.4 70848.02       255       75       0.05
4 cat22Mar  730 630347.1 70843.96       291      163       0.05
5 cat22May  456 630342.3 70846.16       312      190       0.06
6 cat22Nov  955 630341.2 70849.68       211      204       0.08
7 cat22Oct 1132 630337.3 70844.44       189      216       0.07
8 cat22Sep 1701 630342.7 70845.91       146      194       0.11

> MCP100CAT22df
            x        y
654  2.747200 48.33885
1602 2.747423 48.33798
3273 2.747506 48.33760
1518 2.747228 48.33710
2947 2.746989 48.33689
5576 2.745139 48.33646
1469 2.744568 48.33664
2807 2.744596 48.33876
2993 2.744705 48.33906
7851 2.745419 48.33940
6301 2.746093 48.33969
3244 2.746600 48.33940
6541 2.747200 48.33885
```



Cat 23

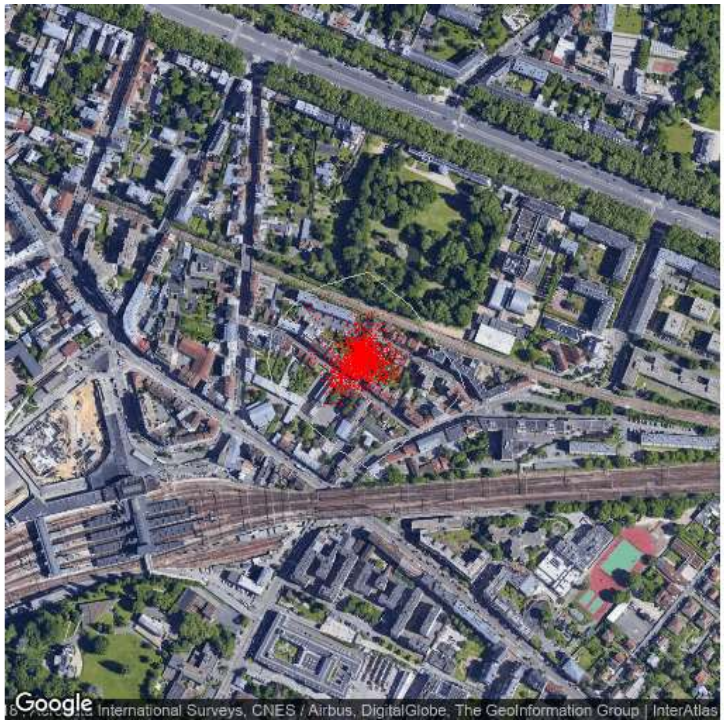
```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
         id    burst nb.reloc NAs          date.begin            date.end
1  cat23Apr cat23Apr      234   0 2016-04-05 07:14:49 2016-04-07 08:20:02
2  cat23Aug cat23Aug      216   0 2016-08-22 14:55:05 2016-08-24 12:48:54
3  cat23Feb cat23Feb      193   0 2016-02-09 11:08:45 2016-02-11 11:27:15
4  cat23Jan cat23Jan       82   0 2016-01-06 11:39:04 2016-01-08 12:29:22
5  cat23Jul cat23Jul      438   0 2016-07-04 06:05:18 2016-07-06 09:28:05
6  cat23Jun cat23Jun      173   0 2016-06-06 20:36:50 2016-06-08 19:59:55
7  cat23Mar cat23Mar      100   0 2016-03-14 14:48:47 2016-03-16 09:43:56
8  cat23May cat23May      480   0 2016-05-16 18:35:26 2016-05-22 00:04:49
9  cat23Oct cat23Oct      465   0 2016-10-12 09:12:39 2016-10-14 15:07:03
10 cat23Sep cat23Sep      196   0 2016-09-14 08:28:45 2016-09-16 05:46:46

> CAT23_TABLE1
         id  nb   X_mean   Y_mean mean_time max_dist mean_speed
1  cat23Apr 234 585524.7 121845.5       758      118       0.03
2  cat23Aug 216 585517.1 121846.4       769       54       0.02
3  cat23Feb 193 585521.1 121849.6       906       73       0.02
4  cat23Jan  82 585534.7 121844.1      2171      100       0.01
5  cat23Jul 438 585513.9 121847.4       423       92       0.05
6  cat23Jun 173 585522.6 121848.3       992      102       0.02
7  cat23Mar 100 585518.7 121841.6      1561       88       0.01
8  cat23May 480 585518.6 121851.2       943      142       0.02
9  cat23Oct 465 585521.2 121849.4       418      131       0.04
10 cat23Sep 196 585522.4 121847.8       836       83       0.03

> MCP100CAT23df
             x        y
2058  2.140147 48.79750
73    2.140866 48.79686
2418  2.140945 48.79670
32    2.140795 48.79657
599   2.140656 48.79646
1428  2.139500 48.79591
1427  2.139004 48.79612
852   2.138131 48.79665
615   2.137989 48.79696
614   2.138062 48.79725
626   2.138546 48.79765
873   2.139504 48.79785
20581 2.140147 48.79750
```



Cat 24

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
         id    burst nb.reloc NAs          date.begin            date.end
1  cat24Apr cat24Apr      971   0 2016-04-10 06:26:04 2016-04-12 06:56:55
2  cat24Aug cat24Aug      705   0 2016-08-28 07:39:25 2016-08-30 04:58:02
3  cat24Feb cat24Feb      861   0 2016-02-06 13:01:48 2016-02-08 12:39:48
4  cat24Jan cat24Jan      594   0 2016-01-09 13:17:32 2016-01-11 18:57:36
5  cat24Jul cat24Jul     1167   0 2016-07-09 07:01:15 2016-07-11 07:07:57
6  cat24Jun cat24Jun     1050   0 2016-06-09 05:42:13 2016-06-11 08:48:57
7  cat24Mar cat24Mar      933   0 2016-03-11 08:16:33 2016-03-13 07:42:54
8  cat24May cat24May     1080   0 2016-05-05 14:28:31 2016-05-07 12:27:43
9  cat24Oct cat24Oct     1103   0 2016-10-15 07:27:01 2016-10-17 07:06:55
10 cat24Sep cat24Sep      658   0 2016-09-18 12:14:43 2016-09-20 11:47:22

> CAT24_TABLE1
         id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1  cat24Apr  971 587242.4 122214.1       180      114       0.10
2  cat24Aug  705 587242.8 122221.5       232      118       0.07
3  cat24Feb  861 587242.1 122221.8       199      104       0.09
4  cat24Jan  594 587238.8 122219.8       326       84       0.06
5  cat24Jul 1167 587247.6 122220.1       149      115       0.10
6  cat24Jun 1050 587244.1 122214.9       175      180       0.11
7  cat24Mar  933 587241.8 122215.4       183      105       0.09
8  cat24May 1080 587241.3 122221.3       153      122       0.12
9  cat24Oct 1103 587242.2 122217.7       156       92       0.10
10 cat24Sep  658 587243.1 122217.6       261      117       0.07

> MCP100CAT24df
             x        y
8381  2.164150 48.80072
2622  2.163814 48.79996
4835  2.163728 48.79980
4446  2.163019 48.79938
4807  2.161256 48.79929
6997  2.160617 48.80000
6986  2.161633 48.80117
5980  2.162475 48.80138
7912  2.163642 48.80120
83811 2.164150 48.80072
```


Google
International Surveys, CNES / Airbus, DigitalGlobe, The GeoInformation Group | InterAtlas

Cat 25

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat25Aug cat25Aug     1495   0 2016-08-23 09:05:09 2016-08-25 10:26:36
2 cat25Feb cat25Feb      529   0 2016-02-06 12:08:58 2016-02-08 07:13:01
3 cat25Mar cat25Mar      935   0 2016-03-05 06:32:40 2016-03-14 06:43:20
4 cat25May cat25May     1408   0 2016-05-01 08:58:03 2016-05-07 16:19:13
5 cat25Oct cat25Oct      705   0 2016-10-16 12:49:21 2016-10-18 15:16:00
6 cat25Sep cat25Sep     1721   0 2016-09-10 05:46:25 2016-09-12 04:19:33

> CAT25_TABLE1
        id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat25Aug 1495 584834.6 93977.29       119      116       0.12
2 cat25Feb  529 584843.1 93970.20       294      136       0.06
3 cat25Mar  935 584847.5 93970.58       833       88       0.02
4 cat25May 1408 584844.8 93969.08       387      106       0.05
5 cat25Oct  705 584839.1 93972.99       258      123       0.07
6 cat25Sep 1721 584832.4 93974.24        97      116       0.15

> MCP100CAT25df
             x        y
1409  2.132572 48.54657
279   2.132280 48.54553
1095  2.131924 48.54531
5476  2.131443 48.54533
5679  2.131086 48.54535
324   2.130650 48.54559
362   2.130242 48.54583
1385  2.130043 48.54627
5186  2.130579 48.54689
2635  2.130720 48.54697
6148  2.131740 48.54727
14091 2.132572 48.54657
```

Cat 26

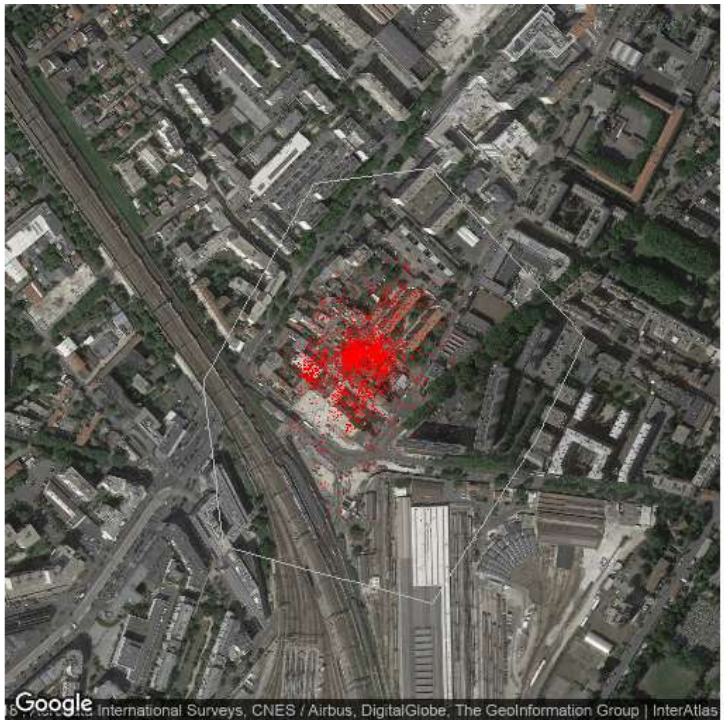
```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat26Apr cat26Apr      566   0 2016-04-10 09:59:54 2016-04-11 20:13:00
2 cat26Feb cat26Feb      265   0 2016-02-06 10:03:31 2016-02-07 19:17:22
3 cat26Jan cat26Jan      247   0 2016-01-09 06:36:06 2016-01-10 18:41:56
4 cat26Jun cat26Jun      571   0 2016-06-19 08:37:40 2016-06-20 17:00:32
5 cat26Mar cat26Mar      216   0 2016-03-19 10:10:48 2016-03-20 22:51:33
6 cat26May cat26May      702   0 2016-05-07 10:08:45 2016-05-08 19:28:45
7 cat26Sep cat26Sep      976   0 2016-09-24 08:45:32 2016-09-25 13:30:19

> CAT26_TABLE1
        id  nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat26Apr 566 597516.2 123538.8       218      226       0.14
2 cat26Feb 265 597511.1 123509.4       453      180       0.04
3 cat26Jan 247 597519.8 123512.0       528      195       0.04
4 cat26Jun 571 597503.1 123512.3       205      194       0.09
5 cat26Mar 216 597506.8 123507.6       614      109       0.03
6 cat26May 702 597513.6 123515.3       171      207       0.10
7 cat26Sep 976 597498.8 123496.7       106      134       0.17

> MCP100CAT26df
           x        y
977  2.305922 48.81233
1676 2.305161 48.81128
1675 2.303639 48.80971
2311 2.300504 48.81027
1171 2.300202 48.81190
408  2.301849 48.81385
858  2.303622 48.81400
9771 2.305922 48.81233
```



Cat 27

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat27Apr cat27Apr      710   0 2016-04-11 17:18:04 2016-04-13 17:07:04
2 cat27Aug cat27Aug     1596   0 2016-08-26 18:48:17 2016-08-28 17:29:11
3 cat27Feb cat27Feb      375   0 2016-02-05 22:43:52 2016-02-07 18:55:03
4 cat27Jun cat27Jun      544   0 2016-06-17 07:04:08 2016-06-19 08:26:35
5 cat27Mar cat27Mar      631   0 2016-03-13 18:00:27 2016-03-15 17:24:54
6 cat27May cat27May     1026   0 2016-05-18 17:25:55 2016-05-20 16:19:57
7 cat27Oct cat27Oct      264   0 2016-10-15 16:19:26 2016-10-16 00:52:55
8 cat27Sep cat27Sep      271   0 2016-09-19 21:49:06 2016-09-20 17:45:09

> CAT27_TABLE1
        id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat27Apr  710 608386.8 128131.1       243      128       0.06
2 cat27Aug 1596 608384.9 128133.0       105      144       0.14
3 cat27Feb  375 608386.8 128136.6       425       73       0.04
4 cat27Jun  544 608388.3 128135.3       327       80       0.05
5 cat27Mar  631 608385.5 128130.3       271      122       0.06
6 cat27May 1026 608386.5 128134.8       165       84       0.09
7 cat27Oct  264 608383.1 128124.9       117      140       0.14
8 cat27Sep  271 608412.2 128139.7       266      209       0.09

> MCP100CAT27df
             x        y
4984  2.452636 48.85423
5026  2.451963 48.85255
5025  2.451582 48.85239
4927  2.450559 48.85259
3500  2.449168 48.85309
3571  2.449048 48.85345
984   2.450169 48.85468
4968  2.452565 48.85434
49841 2.452636 48.85423
```

Cat 28

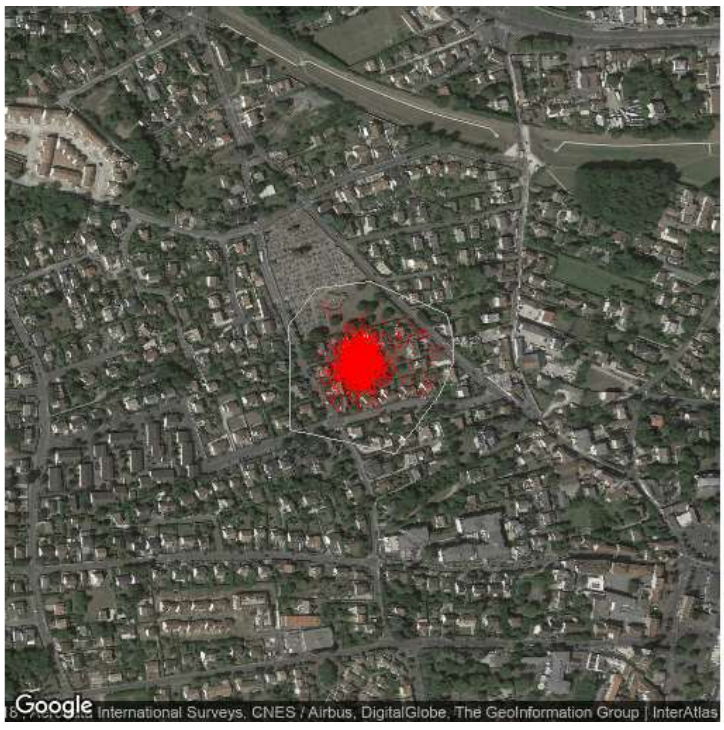
```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
        id    burst nb.reloc NAs          date.begin            date.end
1 cat28Apr cat28Apr     1613   0 2016-04-09 10:05:26 2016-04-10 22:00:36
2 cat28Aug cat28Aug     1404   0 2016-08-22 07:00:52 2016-08-24 08:05:04
3 cat28Feb cat28Feb      677   0 2016-02-06 08:15:03 2016-02-08 07:58:13
4 cat28Jan cat28Jan     1091   0 2016-01-16 07:01:10 2016-01-17 23:59:04
5 cat28Jul cat28Jul     1235   0 2016-07-15 06:56:01 2016-07-17 08:56:02
6 cat28Jun cat28Jun     1382   0 2016-06-13 06:10:20 2016-06-14 21:38:11
7 cat28Mar cat28Mar     1493   0 2016-03-13 08:27:51 2016-03-15 07:44:54
8 cat28May cat28May     1370   0 2016-05-07 06:38:03 2016-05-08 23:36:15

> CAT28_TABLE1
        id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1 cat28Apr 1613 614154.4 113743.7        80      101       0.06
2 cat28Aug 1404 614156.1 113743.9       126       92       0.11
3 cat28Feb  677 614154.5 113743.7       254      137       0.07
4 cat28Jan 1091 614152.3 113743.1       135       86       0.12
5 cat28Jul 1235 614156.3 113743.8       146      111       0.08
6 cat28Jun 1382 614149.8 113745.0       103      117       0.12
7 cat28Mar 1493 614151.2 113742.6       114       94       0.13
8 cat28May 1370 614151.7 113744.4       108      108       0.12

> MCP100CAT28df
             x        y
3596  2.530256 48.72433
6757  2.530247 48.72412
8135  2.530065 48.72380
7051  2.529377 48.72321
8773  2.527807 48.72344
1361  2.527785 48.72447
1841  2.528205 48.72483
9086  2.529016 48.72491
8332  2.530141 48.72458
35961 2.530256 48.72433
```



Cat 29

```
********** List of class ltraj **********

Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
         id    burst nb.reloc NAs          date.begin            date.end
1  cat29Apr cat29Apr     1302   0 2016-04-15 19:05:51 2016-04-17 19:25:17
2  cat29Aug cat29Aug     2191   0 2016-08-23 07:51:27 2016-08-25 04:41:08
3  cat29Feb cat29Feb      912   0 2016-02-13 20:50:24 2016-02-15 19:31:25
4  cat29Jan cat29Jan      767   0 2016-01-05 09:21:37 2016-01-07 08:34:19
5  cat29Jul cat29Jul     2497   0 2016-07-15 14:54:43 2016-07-17 15:58:48
6  cat29Jun cat29Jun     2357   0 2016-06-17 20:37:52 2016-06-19 20:12:33
7  cat29Mar cat29Mar      742   0 2016-03-12 18:28:28 2016-03-14 18:57:29
8  cat29May cat29May     2251   0 2016-05-06 08:11:23 2016-05-09 12:28:05
9  cat29Oct cat29Oct     1301   0 2016-10-01 00:00:02 2016-10-02 00:02:59
10 cat29Sep cat29Sep     3257   0 2016-09-15 14:58:17 2016-09-30 23:59:01

> CAT29_TABLE1
         id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1  cat29Apr 1302 593288.2 124031.3       134       81        0.11
2  cat29Aug 2191 593287.9 124033.3        74      173        0.05
3  cat29Feb  912 593286.3 124033.2       184      101        0.08
4  cat29Jan  767 593286.1 124035.2       222      116        0.08
5  cat29Jul 2497 593287.7 124038.0        71       59        0.05
6  cat29Jun 2357 593290.1 124033.3        73       70        0.07
7  cat29Mar  742 593285.8 124034.4       236      125        0.07
8  cat29May 2251 593287.5 124033.8       122       71        0.03
9  cat29Oct 1301 593287.8 124032.8        67       46        0.06
10 cat29Sep 3257 593288.2 124033.7       408       82        0.02

> MCP100CAT29df
             x        y
53    2.245531 48.81734
10836 2.246072 48.81640
10835 2.246247 48.81589
2343  2.243600 48.81620
52    2.244247 48.81795
2880  2.245119 48.81763
13025 2.245349 48.81748
531   2.245531 48.81734
```

Cat 30

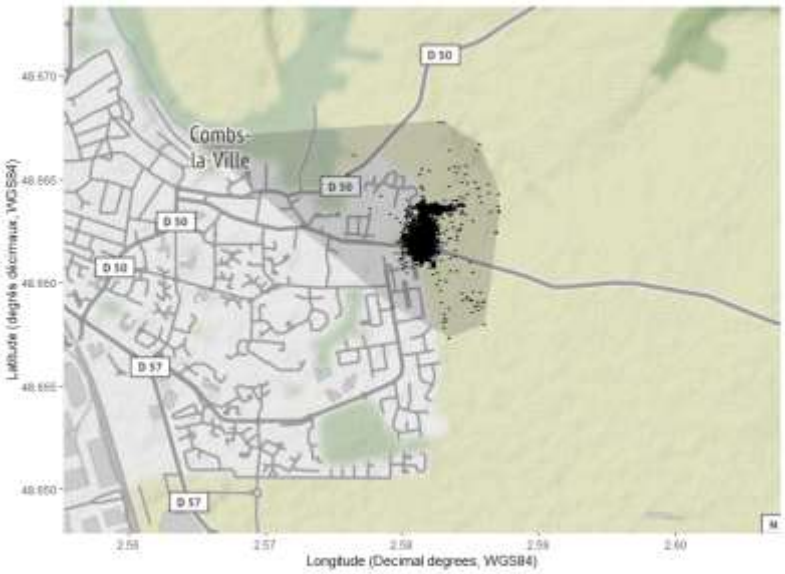
```
********************* List of class ltraj ***********


Type of the traject: Type II (time recorded)
* Time zone: GMT *
Irregular traject. Variable time lag between two locs

Characteristics of the bursts:
         id    burst nb.reloc NAs          date.begin            date.end
1  cat30Apr cat30Apr     1503   0 2016-04-12 20:45:51 2016-04-15 04:46:47
2  cat30Aug cat30Aug     1525   0 2016-08-10 18:21:01 2016-08-13 06:08:08
3  cat30Feb cat30Feb     1330   0 2016-02-10 13:07:51 2016-02-12 18:13:08
4  cat30Jan cat30Jan      969   0 2016-01-08 12:42:06 2016-01-13 17:42:43
5  cat30Jul cat30Jul     1444   0 2016-07-13 13:54:41 2016-07-15 19:26:47
6  cat30Jun cat30Jun     2008   0 2016-06-06 14:18:04 2016-06-11 04:26:55
7  cat30Mar cat30Mar      938   0 2016-03-11 06:22:13 2016-03-13 06:02:05
8  cat30May cat30May      456   0 2016-05-19 06:54:37 2016-05-20 06:08:14
9  cat30Oct cat30Oct      948   0 2016-10-12 06:27:02 2016-10-14 23:59:27
10 cat30Sep cat30Sep     2066   0 2016-09-10 07:30:59 2016-09-13 06:09:45

> CAT30_TABLE1
         id   nb   X_mean   Y_mean mean_time max_dist mean_speed
1  cat30Apr 1503 618034.9 106837.1       134      126       0.09
2  cat30Aug 1525 618063.0 106909.9       141      427       0.12
3  cat30Feb 1330 618033.2 106863.5       144      161       0.16
4  cat30Jan  969 618037.8 106842.1       465      208       0.04
5  cat30Jul 1444 618041.9 106848.7       134      245       0.11
6  cat30Jun 2008 618040.1 106861.7       198      189       0.08
7  cat30Mar  938 618046.9 106851.3       183     1327       0.28
8  cat30May  456 618048.8 106865.1       184      149       0.10
9  cat30Oct  948 618056.1 106900.5       249      208       0.06
10 cat30Sep 2066 618054.6 106888.9       123      342       0.11

> MCP100CAT30df
             x        y
2897  2.587127 48.66430
2875  2.587145 48.66342
2936  2.586038 48.65798
2854  2.583461 48.65736
2832  2.579397 48.65884
2943  2.564766 48.66699
2942  2.582739 48.66783
2941  2.583131 48.66778
2902  2.585660 48.66672
28971 2.587127 48.66430
```



Map based on OpenStreetMap package.