

Supplementary Information

Supplementary Table 1: Detailed information of sequences used for phylogenetic analysis, including accession numbers, host organisms, and the references.

S. No	Accession Number	Species	Host	Country/Origin	References
1	AJ580493	<i>Leptospira interrogans</i>	Dog	India (Uttar Pradesh)	NCBI Direct Submission
2	KF184514	<i>Leptospira interrogans</i>	Dog	Argentina	NCBI Direct Submission
3	KF184506	<i>Leptospira interrogans</i>	Rat	Argentina	NCBI Direct Submission
4	KF184507	<i>Leptospira interrogans</i>	Rat	Argentina	NCBI Direct Submission
5	EU526391	<i>Leptospira interrogans</i>	Human	India (Tamil nadu)	NCBI Direct Submission
6	JN210551	<i>Leptospira interrogans</i>	Human	India (Tamil nadu)	NCBI Direct Submission
7	KP032210	<i>Leptospira interrogans</i>	Human	India (Tamil nadu)	NCBI Direct Submission
8	GU220823	<i>Leptospira interrogans</i>	Cattle	India (Tamil nadu)	NCBI Direct Submission
9	PQ407920	<i>Leptospira interrogans</i>	Cattle	India (Tamil u)	NCBI Direct Submission
10	PP481960L	<i>Leptospira interrogans</i>	Bos taurus	India (Kerala)	NCBI Direct Submission
11	AY461895	<i>Leptospira borgpetersenii</i>	Human	Los Angeles, USA	NCBI Direct Submission
12	AF181554	<i>Leptospira borgpetersenii</i>	Human	Los Angeles, USA	Haake. et al., 2004
13	JN683896	<i>Leptospira kirschneri</i>	Human	Paris, France	Bourhy et al., 2021
14	AY461916	<i>Leptospira kirschneri</i>	Human	Los Angeles, USA	Haake. et al., 2004
15	NPDP01000002	<i>Leptospira kmetyi</i>	Tropical soil	Uruguay	Direct Submission
16	JN683897	<i>Leptospira mayottensis</i>	Human	Paris, France	Bourhy et al., 2021
17	KT338926	<i>Leptospira mayottensis</i>	Human	France	Lagadec et al., 2016
18	CP091940	<i>Leptospira noguchii</i>	Global	Canada	Direct Submission
19	AY461920	<i>Leptospira noguchii</i>	Human	Paris, France	Bourhy et al., 2021
20	PP049024	<i>Leptospira noguchii</i>	Human	Paris, France	Bourhy et al., 2021
21	PZ201987	MT10802	Dog	India (Darjeeling)	This Study
22	PZ201987	MT10811	Dog	India (Darjeeling)	This Study
23	PZ201987	MT10810	Dog	India (Darjeeling)	This Study
24	PZ201987	MT10796	Dog	India (Darjeeling)	This Study
25	PZ201987	MT10795	Dog	India (Darjeeling)	This Study
26	PZ201988	MT10717	Human	India (Darjeeling)	This Study
27	PZ201988	MT10710	Human	India (Darjeeling)	This Study
28	PZ201988	MT10715	Human	India (Darjeeling)	This Study
29	PZ201988	MT10746	Human	India (Darjeeling)	This Study
30	PZ201988	MT10698	Human	India (Darjeeling)	This Study
31	PZ201988	MT10787	Human	India (Darjeeling)	This Study

32	PZ201988	MT10793	Human	India (Darjeeling)	This Study
33	PZ201988	MT10731	Human	India (Darjeeling)	This Study
34	PZ201988	MT10747	Human	India (Darjeeling)	This Study
35	PZ201989	MT10812	Rat	India (Darjeeling)	This Study
36	AE000788.1	<i>Borrelia burgdorferi</i>	Outgroup	USA	Fraser et al., 1997