Extended Data Figures & Tables

Extended data Table 1. Leaf-level structures are assigned to high-level regions differently in the two atlases. Abbreviations: TEL: telencephalon/cerebrum; DIEN: diencephalon/interbrain; MID: midbrain; PONS: pons; MED: medulla oblongata; CvO: circumventricular organs.

	Marmoset			Mouse		
Type	Acronym	Region name	Cerebrotype	Acronym	Region name	Cerebrotype
1	SNC	Substantia nigra; compact part	**TEL**	SNc	Substantia nigra, compact part	**MID**
1	SNL	Substantia nigra; lateral part	**TEL**	SNl	Substantia nigra, lateral part	**MID**
1	SNR	Substantia nigra; reticular part	**TEL**	SNr	Substantia nigra, reticular part	**MID**
1	STh	Subthalamic nucleus	**TEL**	STN	Subthalamic nucleus	**DIEN**
1	E	Ependyma & subependymal layer	**TEL**	SEZ	subependymal zone	**CvO**
1	APT	Anterior pretectal nucleus	**DIEN**	APN	Anterior pretectal nucleus	**MID**
1	MPT	Medial pretectal area	**DIEN**	MPT	Medial pretectal area	**MID**
1	OT	Nucleus of the optic tract	**DIEN**	NOT	Nucleus of the optic tract	**MID**
1	OPT	Olivary pretectal nucleus	**DIEN**	OP	Olivary pretectal nucleus	**MID**
1	PrC	Precommissural nucleus	**DIEN**	PRC	Precommissural nucleus	**MID**
2	MCPC,PCom	Magnocellular nucleus of the posterior commissure,Nucleus of the posterior commissure	**DIEN, MID**	NPC	Nucleus of the posterior commissure	**MID**
1	SCO	Subcommissural organ	**CvO**	SCO	Subcommissural organ	**MID**
1	PP	Peripeduncular nucleus	**MID**	PP	Peripeduncular nucleus	**DIEN**
1	ME	Median eminence	**CvO**	ME	Median eminence	**DIEN**
1	Pi	Pineal gland	**CvO**	PIN	Pineal body	**DIEN**
1	SFO	Subfornical organ	**CvO**	SFO	Subfornical organ	**DIEN**
1	VOLT	Vascular organ of the lamina terminalis	**CvO**	OV	Vascular organ of the lamina terminalis	**DIEN**
1	ATg	Anterior tegmental nucleus	**PONS**	AT	Anterior tegmental nucleus	**MID**
1	6N	Abducens nucleus	**PONS**	VI	Abducens nucleus	**MED**
1	DC	Dorsal cochlear nucleus	**PONS**	DCO	Dorsal cochlear nucleus	**MED**
1	GrC	Granule cell layer of the cochlear nuclei	**PONS**	CNlam	Granular lamina of the cochlear nuclei	**MED**
2	VCA,VCP	Ventral cochlear nucleus; anterior part,Ventral cochlear nucleus; posterior part	**PONS**	VCO	Ventral cochlear nucleus	**MED**
2	7N,7SH	Facial nucleus,Facial motor nucleus; stylohyoid part	**PONS**	VII	Facial motor nucleus	**MED**
1	Tz	Nucleus of the trapezoid body	**PONS**	NTB	Nucleus of the trapezoid body	**MED**
1	AP	Area postrema	**CvO**	AP	Area postrema	**MED**
1	PBG	Parabigeminal nucleus	**PONS**	PBG	Parabigeminal nucleus	**MID**
1	PTg	Pedunculotegmental nucleus	**PONS**	PPN	Pedunculopontine nucleus	**MID**
1	CLi	Caudal linear nucleus of the raphe	**PONS**	CLI	Central linear nucleus raphe	**MID**
1	RMg	Raphe magnus nucleus	**PONS**	RM	Nucleus raphe magnus	**MED**
1	Sag	Sagulum nucleus	**PONS**	SAG	Nucleus sagulum	**MID**
1	LT	Lateral terminal nucleus of the accessory optic tract	**MED**	LT	Lateral terminal nucleus of the accessory optic tract	**MID**
1	KF	Kolliker-Fuse nucleus	**MED**	KF	Koelliker-Fuse subnucleus	**PONS**
1	SuS	Superior salivatory nucleus	**MED**	SSN	Superior salivatory nucleus	**PONS**

Extended data Table 2. A list of the 5 core atlas resources used for ontological, volumetric, or both sets of mouse-marmoset anatomical comparisons in the manuscript.

Atlas Abbr. Name	Atlas Citation
Allen Mouse Atlas	Wang, Q. *et al.* The Allen Mouse Brain Common Coordinate Framework: A 3D Reference Atlas. *Cell* **181**, 936-953.e20 (2020).
Paxinos Mouse Atlas	Paxinos, G. & Franklin, K. The Mouse Brain in Stereotaxic Coordinates. (2004).
Paxinos Marmoset Atlas	Paxinos, G., Watson, C., Petrides, M., Rosa, M. & Tokuno, H. *The Marmoset Brain in Stereotaxic Coordinates*. (Academic Press, 2012). doi:10.1016/j.brainresbull.2013.01.009.
RIKEN Marmoset	Hashikawa, T. *et al.* The 3-Dimensional Atlas of the Marmoset Brain, Reconstructible in Stereotaxic Coordinates. *Brain Sci* 33–329 (2018) doi:10.1007/978-4-431-56612-0_2.
NIH-Silva Marmoset	Liu, C. *et al.* A digital 3D atlas of the marmoset brain based on multi-modal MRI. *NeuroImage* **169**, 106–116 (2018).
Saleem Marmoset	Saleem KS, Avram AV, Yen CC, Magdoom KN, Schram V, Basser PJ. Multimodal anatomical mapping of subcortical regions in Marmoset monkeys using high-resolution MRI and matched histology with multiple stains. bioRxiv [Preprint]. 2023. doi: 10.1101/2023.03.30.534950. PMID: 37034636; PMCID: PMC10081239.

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