

## Lateralization of the perception of communicative vocalizations in Japanese macaques

H. E. HEFFNER, R. S. HEFFNER

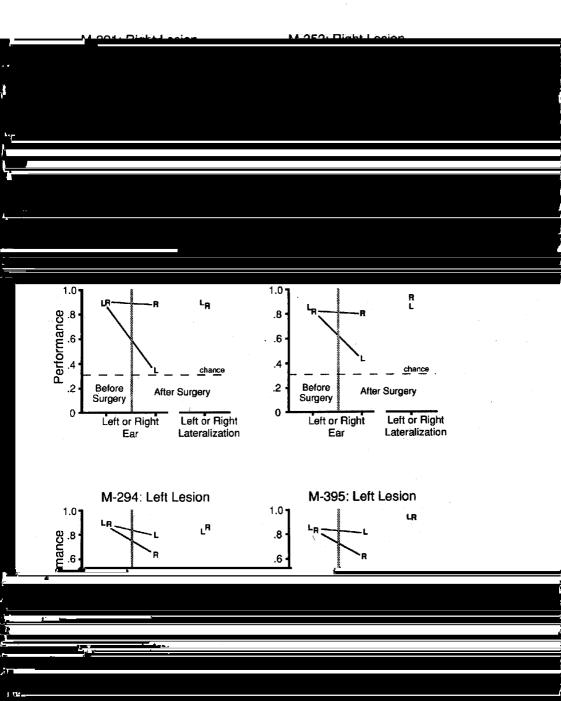
University of Toledo, Toledo, USA

The most prominent evidence for lateralization in the human nervous system is the location of the speech areas in the left hemisphere. In particular, the cortical area involved in the recognition of speech appears to be located in

	reporting verbal information received by the right ear in a dichotic listening task.
•	The presence of a right-eer advantage in Ionanaca-mesones
`.	
· 	
i i e	
1	
1 1	
e e e e e e e e e e e e e e e e e e e	
<b>7</b> -24	



	Green (1975) and had been used to demonstrate a right ear advantage in Janeans and accompany
	<u></u>
7	
<u> </u>	
<u> </u>	
200	
• .	
	(for details of the coos, see Beecher et al., 1979). They consist of seven "smooth early high"
	(SF) and eight "smooth late high" (SI) occo. The ocea are distinguished by the the time of
1	
<u> </u>	
<u>.                                    </u>	
1 1	
1	
. \- <u>-</u>	
ķ	
•	
) - }	
<u></u>	



	extensive training lower 100 training accidence and associatently accord	۰۸ مـــ
<b></b>		
<b>\</b>		
1		
	better for each ear. Because the right-ear advantage for this task is ap	narent
	enly during the initial exercisition of the disconnection of the	
		1000)
	only during the initial exercisition of the discontinuous of the last 1	
<u>.</u>	and during the initial exercisition of the discontinuous of the disconti	
<b>.</b>	only during the initial exercisition of the discount of the Alexander of	
	only during the initial exercisition of the discontinuity of the last 1	
<b>.</b>	only during the initial exercisition of the disconnection (M. d. d.	
<b>.</b>	only during the initial exercisition of the live discount of the live of	
<b>.</b>	oply during the initial exercisition of the discontinuity of the desired at the second of the second	
	only during the initial correlation of the discontinuous of the desired of the de	
<b>.</b>	only during the initial exercisition of the disconnection (Mr. 1	
	only during the initial exercisition of the disconnection (M. d. d. d.	
	oply during the initial correlation of the discontinuous of the during of the discontinuous of the during of the d	
	oply during the initial exercisition of the discontinuous (Mr. 1	
	oply during the initial exercisition of the disconnection (Mr. 1	
	oply during the initial correlation of the disconnection of the desired transfer of the desired transf	
	only during the initial engine sides of the disconnection (Minhael)	
	anly during the initial exception of the discontinuous (Manufacture (M	
	enly during the initial constitution of the discontinuities (Marketine (Marke	

C

	Indeed, given the large number of auditory decussations, it is quite possible for input to cross back and forth before reaching the cortex.
<u> </u>	
•	
	414
τ	
<u>ار</u> نات	
(25)	
هـ-ت	

8 (Macaca fuscata): A field study. In Rosenblum, L.A. (ed.), Primate behavior, Vol. 4, Academic Press, New York, pp. 1-102. Heffner, H.E. & Heffner, R.S. (1984). Temporal lobe lesions and perception of species-specific vocalizations by macaques. Science 226: 75-76. Heffner, H.F. & Heffner, R.S. (1986). Effect of unilateral and bilateral auditory cortex legions on the discrimination of vocalizations by Japanese macaques. J. Neurophysiol. 56: 683-Heffner, H.E. & Heffner, R.S. (1989). Effect of restricted cortical lesions on absolute thresholds and the discrimination of species-specific sounds by Japanese macaques. Behav. Neurosci. 103: 158-169.

Heffner, H.E. & Heffner, R.S. (1990a). Effect of bilateral auditory cortex lesions on absolute