

Supporting Information

Supporting Information Figure Legend

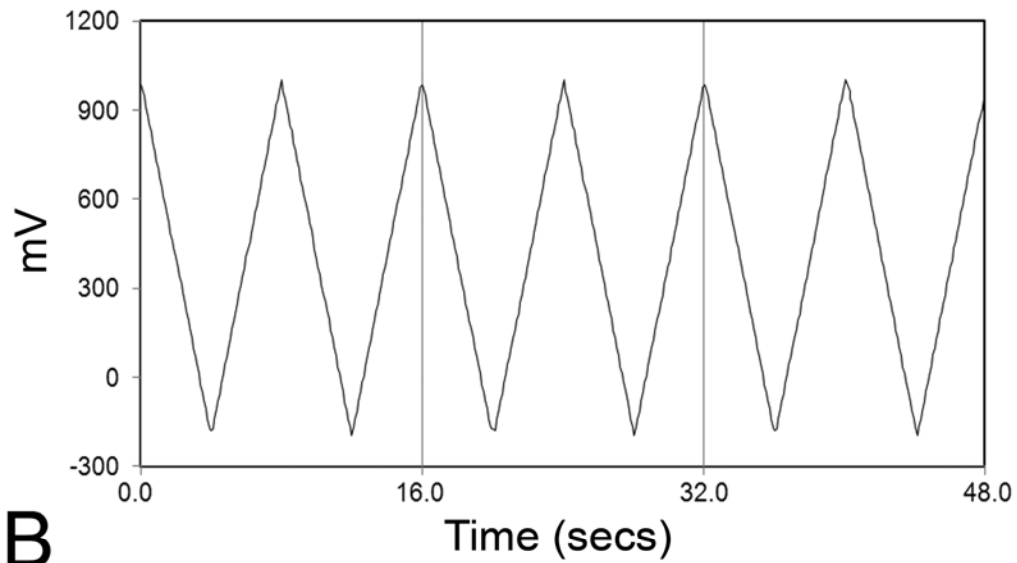
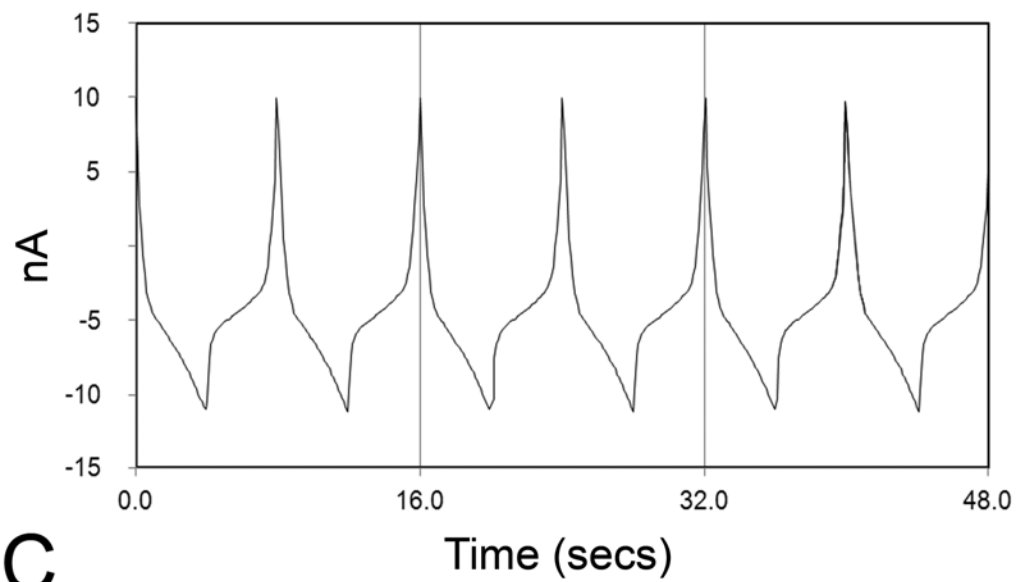
Waveforms of Cyclic Voltammetry. Panel A. Input voltage waveform to the potentiostat (-0.2 to $+1.0$ V vs Ag/AgCl). Panel B. Output current signal from a nCFM in KRBB. The applied voltage profile (Panel A) generated a current versus time profile that was stable over time (>10 minutes) and allowed us to measure the Faradaic current (i.e. generated from the oxidation and reduction of monoamines) within the larger background capacitive current. To obtain the Faradaic current versus input voltage profile (Panel C), the current versus time profile obtained with 100 μM DA, 50 μM DA, 1 μM DA, 250 nM DA or 5 μM Serotonin (5-HT) in KRBB was subtracted from the profile obtained in KRBB alone. The average cyclic voltammogram (averaged over > 10 cycles) for each concentration of monoamine used is shown in panel C. The obtained oxidation and reduction peaks for DA ($+220$ mV and $+120$ mV respectively) were similar to those reported for CV performed under similar conditions[64-66].

Table 1 List of primer pairs used for RT-PCR

Transcript ID	Primers 5'→3'		Amplicon Length (bp)
D2R L and D2R S	4hD2_F	CCCACCTGAGGGCTCCACTA	321 (D2R L) and 234 (D2R S)
	3hD2_R	TGGCAATCTTGGGGTGGTCT	
	4hD2_F	CCCACCTGAGGGCTCCACTA	619 (D2R L) and 532 (D2R S)
	4hD2_R	AGGAAGGCCTTGCGGAACTC	
D2R	2hD2_F	GCTGTGGCCATGCCCATGCT	288
	2hD2_R	TCGGCTGCTGCGTTTGGTGT	
D2R L	Long_hD2_F	CCATCGTCTGGGTCTGTCC	335
	Long_hD2_R	CCGCCTGTTCCTGGGAAAC	
D2R S	Short_hD2_F	TCCACTAAAGGAGGCTGCCC	215
	3hD2_R	TGGCAATCTTGGGGTGGTCT	
ACTB	Hs_ACTB_2_SG	From QIAGEN Cat.No.QT01680476	104
INS	Hs_INS_2_SG	From QIAGEN Cat.No.QT01531040	98
VMAT2	Hs_SLC18A2_1_SG	From QIAGEN Cat.No.QT00059857	73
DAT1	Hs_SLC6A3_1_SG	From QIAGEN Cat.No.QT00000231	74
LAT1	Hs_SLC7A5_1_SG	From QIAGEN Cat.No.QT00089145	106
MDU1	Hs_SLC3A2_1_SG	From QIAGEN Cat.No.QT00085897	126

References

1. Doménech A, García H, Doménech-Carbó MT, Galletero MS (2001) 2,4,6-Triphenylpyrylium Ion Encapsulated into Zeolite Y as a Selective Electrode for the Electrochemical Determination of Dopamine in the Presence of Ascorbic Acid. *Analytical Chemistry* 74: 562-569.
2. Zen J-M, Chen P-J (1997) A Selective Voltammetric Method for Uric Acid and Dopamine Detection Using Clay-Modified Electrodes. *Analytical Chemistry* 69: 5087-5093.
3. Wiedemann DJ, Basse-Tomusk A, Wilson RL, Rebec GV, Wightman RM (1990) Interference by DOPAC and ascorbate during attempts to measure drug-induced changes in neostriatal dopamine with Nafion-coated, carbon-fiber electrodes. *J Neurosci Methods* 35: 9-18.

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