

ABBREVIATIONS

5-HT	5-Hydroxytryptamine
6-OHDA	6-Hydroxydopamine
AC	Adenylate cyclase
Ach	Acetylcholine
AChE	Acetylcholinesterase
AD	Alzheimer's disease
AgRP	Agouti-related peptide
ALS	Amyotrophic lateral sclerosis
AMPA	α -Amino-3-hydroxy-5-methyl-4-isoxazolepropionic acid
anti-ChE	Anticholinesterase
APP	Amyloid precursor protein
ATCI	Acetylthiocholine iodide
AUC	Area under the curve
A β	Amyloid-beta
BACE	β -Secretase
BBB	Blood brain barrier
BDNF	Brain-derived neurotropic factor
BSA	Bovine serum albumin
BTCI	Butyrylthiocholine iodide
BuChE	Butyrylcholinesterase
CaMKII	Calcium/calmodulin dependant protein kinase II
cAMP	Cyclic adenosine monophosphate
CAT	Catalase
ChE	Cholinesterase
CNS	Central nervous system
COMT	Catechol-O-methyl transferase
COX	Cyclooxygenase
CPCSEA	Committee for the Purpose of Control and Supervision of Experiments on Animals
CR	Congo red
DA	Dopamine
DAT	Dopamine transporter
DCFH-DA	2',7'-Dichlorofluorescein diacetate
DHX	Dihydroxidine
DMEM	Dulbecco's Modified Eagle Medium
DOPAC	Dihydroxyphenylacetic acid
DPPH	2,2-Diphenyl-1-picrylhydrazyl
DRN	Dorsal raphe nuclei
DTNB	5,5'-Dithiobis(2-nitrobenzoic acid)
EAA	Excitatory amino acid
ELT	Escape latency time
ER	Endoplasmic reticulum

FBS	Fetal bovine serum
GABA	γ -Aminobutyric acid
GluR	Glutamate receptor
GPCR	G-Protein-coupled receptor
GSK-3	Glycogen synthase kinase 3
HPLC	High-performance liquid chromatography
HPLC-ECD	High performance liquid chromatography with electrochemical detector
Hsp 90	Heat shock protein 90
IAEC	Institutional Animal Ethics Committee
IBS	Irritable bowel syndrome
ICC	Immunocytochemistry
IP3	Inositol triphosphate
LOD	Limit of detection
LOQ	Limit of quantification
LPO	Lipid peroxidation
LRP	Lipoprotein receptor-related protein
LSD	Lysergic acid diethylamide
M1	Muscarinic 1
MAO	Monoamine oxidase
MAPK	Memberane associated protein kinase
MAPK	Mitogen-activated protein kinase
MC	Melanocortin
MDA	Malondialdehyde
mGluR	Metabotropic glutamate receptor
MSNs	Medium spiny neurons
MTT	3-(4,5-Dimethylthiazol-2-yl)-2,5-diphenyltetrazolium bromide
MWM	Morris water maze
Na-CMC	Sodium carboxy methyl cellulose
NE	Norepinephrine
NFTs	Neurofibrillary tangles
NHE	4-Hydroxynonenal
NMDA	<i>N</i> -Methyl- <i>D</i> -aspartate
NMDAR	<i>N</i> -Methyl- <i>D</i> -aspartate receptor
NO	Nitric oxide
NOS	Nitric oxide synthase
NPY	Neuropeptide Y
NSAIDs	Nonsteroidal anti-inflammatory drugs
OPA	Orthophthalaldehyde
PAMPA-BBB	Parallel artificial membrane permeation assay for blood-brain barrier
PARP	Poly (ADP-ribose) polymerase-1
PAS	Peripheral binding site
PBS	Phosphate buffer saline

PD	Parkinson's disease
PDE	Phosphodiesterase
PI	Propidium iodide
PKC	Protein kinase C
PLC	Phospholipase C
PNS	Peripheral nervous system
POMC	Pro-opiomelanocortin
PPAR	Peroxisome proliferator-activated receptor
<i>p</i> -tau	Phosphorylated tau
PVN	Paraventricular nuclei
RAGE	Receptor for advanced glycation end
RNS	Reactive nitrogen species
ROS	Reactive oxygen species
SNpc	Substantia nigra pars compacta
SOD	Superoxide dismutase
SSRI	Selective serotonin re-uptake inhibitor
TBARS	Thiobarbituric acid reacting substance
TBST	Tris-buffered saline/Tween-20
TCA	Trichloroacetic acid
TH	Tyrosine hydroxylase
ThT	Thioflavin T
VTA	Ventral tegmental area
α -MSH	α -Melanocyte-stimulating hormone