

Parkinsonism

- One of the Telugu film personality suffers from this disease- unusual movements of the head
- What is the disease and who is the personality

Parkinsonism

Dr. James Parkinson

- Shaking Palsy (Paralysis Agitans)

- Extra pyramidal system controls the body movements by a balance between cholinergic excitatory and dopaminergic inhibitory influences
- Loss of dopaminergic fibres in Substantia nigra
- Cholinergic excitatory predominance
unopposed by Inhibitory dopaminergic
influence

Extrapyramidal Motor Disorder

- Dopamine production irregular and inadequate
- Nerve cells cannot properly transmit messages
- Results in loss of muscle function
- With medication, neurons are able to transmit messages
- Tremors improve

Symptoms

- Rigidity, Tremor, Hypokinesia

Secondary Manifestations

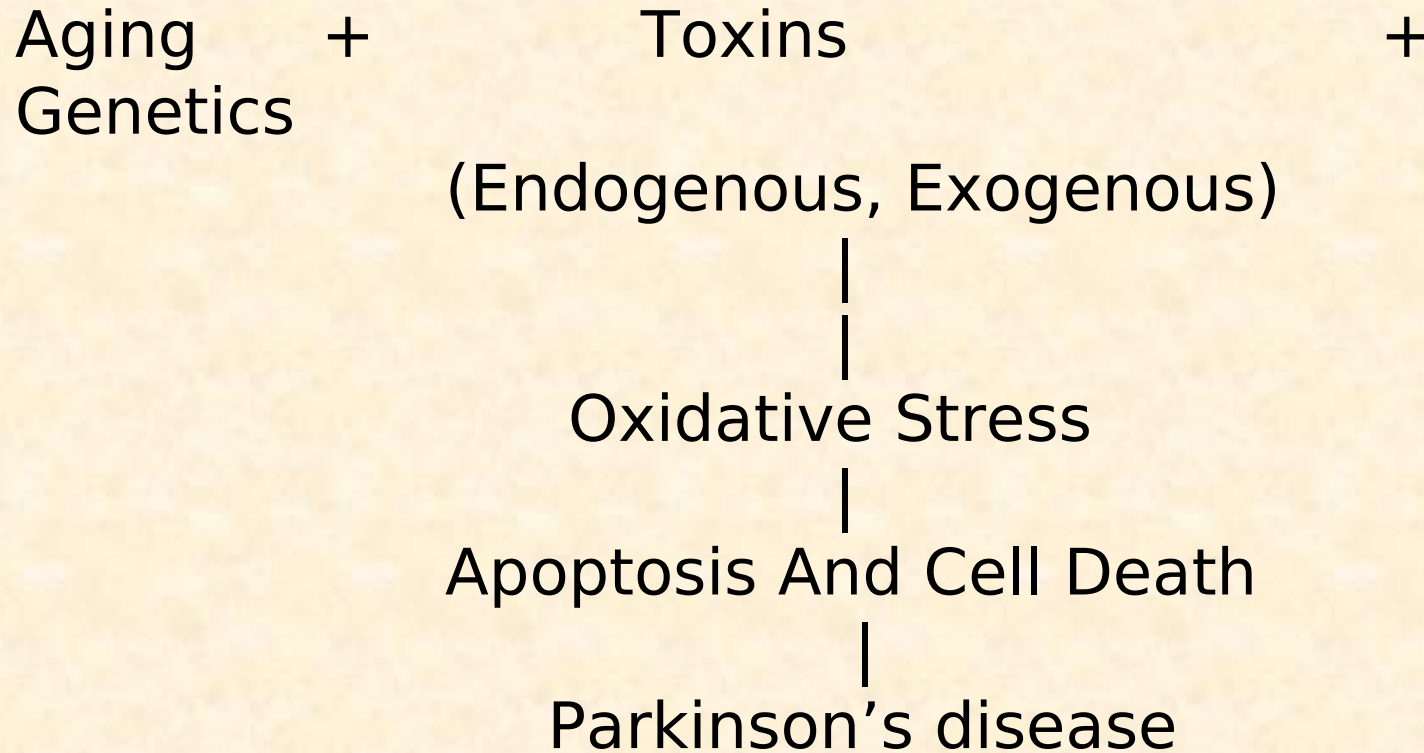
- Defective posture and gait
- Mask like face, sialorrhoea, dementia

End stage complications

Breathing difficulties, Chest infections, Embolism



Causes



Drugs That May Produce or Precipitate Parkinsonism

- Antiepileptics
Vigabatrin. Eg: Valproic Acid,
- Antidepressants
Lithium, Eg: Amoxapine,
- Butyrophenones
Haloperidol. Eg: Droperidol,
- Calcium Channel Blockers
Diltiazem,
Verapamil, Cinnarizine, Eg: Amlodipine,
Flunarizine

- Centrally Acting Antihypertensives

Eg : α -Methyldopa, Reserpine (Rauwolfia serpentine)

- Cholinesterase inhibitors

Eg : Donepezil, Tacrine

- Phenothiazines

Eg : Chlorpromazine, Fluphenazine.

- Miscellaneous

Eg : Disulfiram.

Treatment

- No cure for Parkinson's disease
- Therapy aims at relieving symptoms and improving or maintaining quality of life
- Patient's functional levels, cognitive impairment and age are important considerations before initiating therapy
- Neuroprotective therapy initiated at the earliest

Non- Pharmacological Treatment

- Education, Physical Therapy
- Speech Therapy, Dietary Modification

I. Drugs effecting brain dopaminergic system

a) Dopaminergic precursor

Eg : Levodopa

b) Peripheral Dopadecarboxylase inhibitors

Eg : Carbidopa, benserazide

c) Dopaminergic agonists

Eg : Bromocriptine, pergolide, pramipexole, ropinirole

d) MAO-B inhibitor

Eg : Selegiline

e) COMT inhibitors

II. Drugs affecting brain cholinergic system

a) Central anticholinergics

Eg : Trihexyphenidyl, Biperiden

b) Antihistaminics

Eg : Orphenadrine, promethazine