

# GUNA<sup>®</sup>-BRAIN

FOOD SUPPLEMENT

**THE SYNERGY OF 6  
ACTIVE INGREDIENTS  
FOR A BETTER  
MENTAL EFFICIENCY**





## WHY GUNA®-BRAIN

In a society calling for frantic life and working rhythms and needing better and long-term mental performances, both related to school, job and social life, the concepts of **Aging**, in general, and **brain Aging** in particular, are becoming more and more important. This new branch of medicine has focused the scientific research on "nootropic" substances: nowadays, we talk more correctly of "**BRAIN BOOSTERS**".

These substances are used:

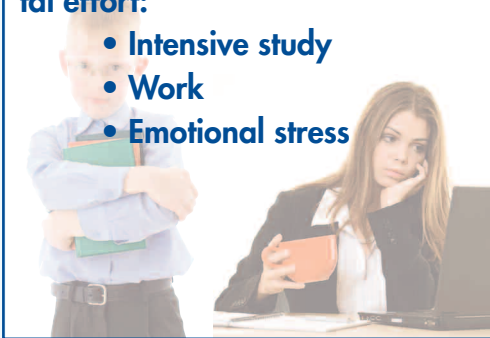


IN HEALTHY SUBJECTS IN ORDER TO

### Strengthen

cognitive capacities and overcome periods of particular mental effort:

- Intensive study
- Work
- Emotional stress



**GUNA®-BRAIN**

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### " BOOSTER "

- SUPPORT
- STRENGTHENING
- STIMULATION



IN CASE OF PREVIOUS OR CURRENT PATHOLOGIES IN ORDER TO

### Slow down

the physiological processes of brain degeneration and to maintain efficient mental performances

Control of the following symptoms:

- Memory loss (mainly short-term memory)
- Space-time disorientation
- Difficulty in developing abstract reasoning
- Objects loss



### Help to recover

the previous mental fitness in case of neurological pathologies



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### "NUTRITIONAL SUPPORT"

- SLOWDOWN IN THE DEVELOPMENT OF DEGENERATIVE NEUROLOGICAL DISORDERS
- RECOVERY OF COGNITIVE FUNCTIONS: TIA (TRANSIT ISCHEMIC ATTACK) OUTCOMES, ALZHEIMER, PARKINSON



## WHAT IS GUNA®-BRAIN?

From the most recent scientific research studies, a NEW GENERATION OF EFFECTIVE, SAFE AND HIGH-COMPLIANCE FOOD SUPPLEMENTS has been emerging from the field of "**BRAIN BOOSTERS**":

**GUNA®-BRAIN**  
FOOD SUPPLEMENT



- ✓ HINDERS BRAIN AGING
- ✓ BOOSTS MEMORY AND COGNITIVE CAPACITIES
- ✓ HELPS A QUICK RECOVERY OF MENTAL EFFICIENCY
- ✓ IS AN EFFECTIVE FOOD SUPPLEMENT THAT SLOWS DOWN THE DEVELOPMENT OF NEUROLOGICAL PATHOLOGIES
- ✓ FIGHTS AGAINST FREE RADICALS IN THE BRAIN AND IN THE BLOOD VESSELS

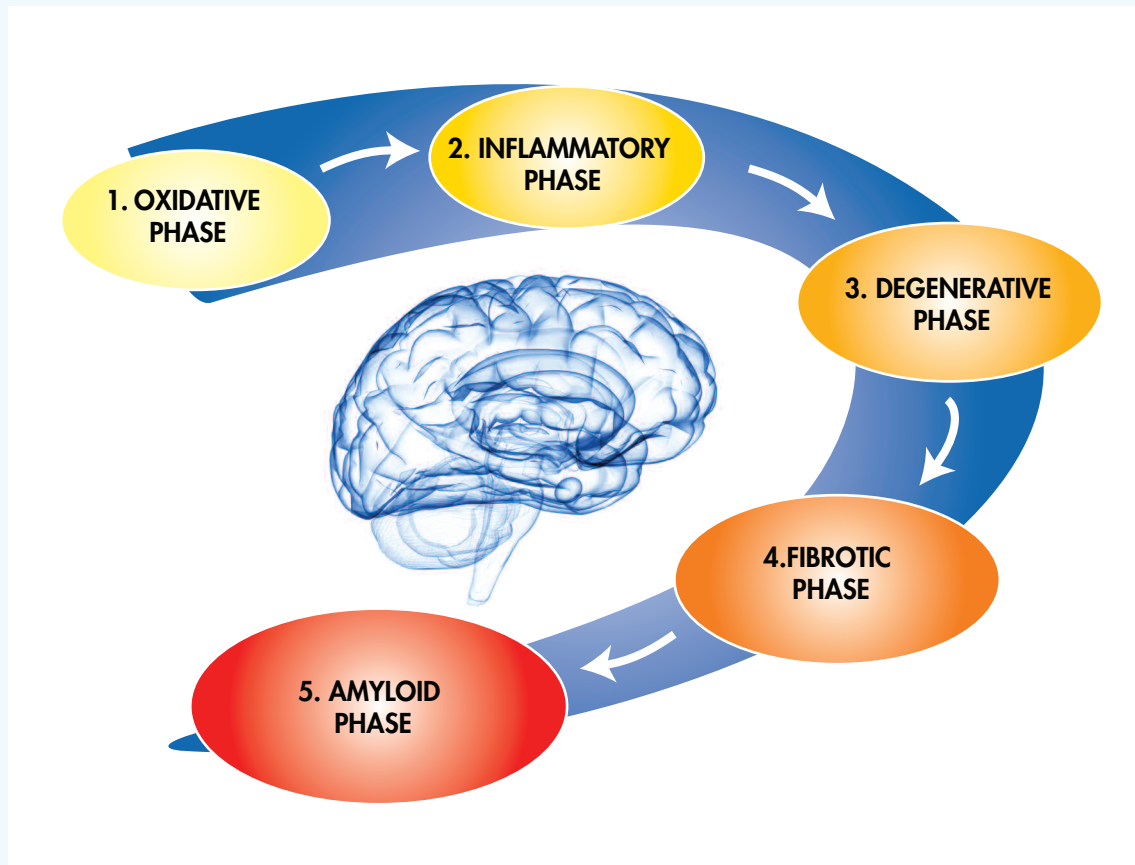
**Guna®-Brain** contains **N-Acetylcysteine (NAC)**, **Selenium**, **Manganese**, **Coenzyme Q<sub>10</sub>**, **titrated plant extracts of Green tea** and **Withania somnifera**. It is an innovative and unique formulation where the SYNERGISM AND THE COMPLEMENTARY ACTION of its ingredients are specifically aimed at:

- PREVENTING A PHYSIOLOGICAL COGNITIVE DECAY AT A FIRST OR A MODERATELY ADVANCED STAGE.
- IMPROVING MEMORY, CONCENTRATION AND ATTENTION QUICKLY IN CASE OF INTENSIVE MENTAL ACTIVITY: INTENSIVE STUDY, WORK, MENTAL FATIGUE.
- HELPING RECOVER THE BRAIN FUNCTION IN CASE OF TIA OUTCOMES, BY IMPROVING THE ARTERIAL MICROCIRCULATION.
- PROTECTING FROM THE OXIDATIVE DAMAGE THAT CAUSES THE CNS CELL AGING.



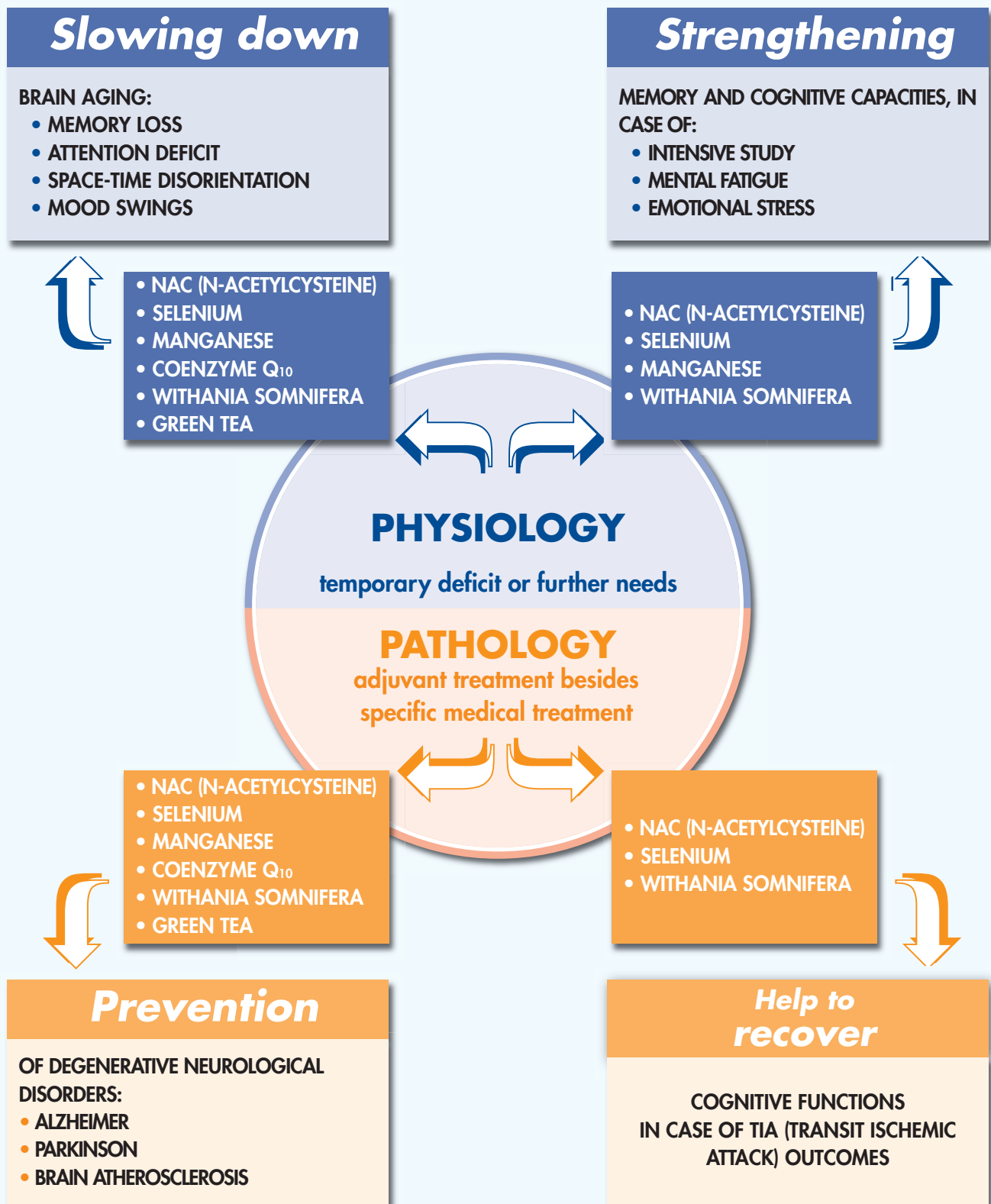
## ETIOPATHOGENESIS OF BRAIN AGING

The most advanced and reliable assumptions about the etiopathogenesis of **Brain aging** refer to different phases:



**ALL INGREDIENTS OF GUNA<sup>®</sup>-BRAIN ARE USEFUL  
AS THEY ACT ON EVERY PHASE  
OF THE ETIOPATHOGENETIC CASCADE  
OF BRAIN AGING.**

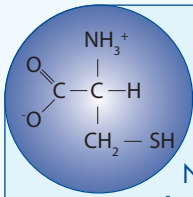
Guna®-Brain is an ideal formulation where **all ingredients act perfectly in synergy** on the **most important mechanisms** of the brain function by:







## ACTIVE INGREDIENTS



### NAC (N –acetylcysteine)<sup>1-5</sup>

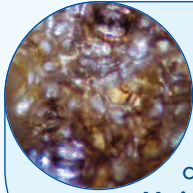
Precursor of **Glutathione**. Together with **Selenium**, it makes up the **glutathione peroxidase** enzyme, a powerful intracellular antioxidant;

**the glutathione peroxidase has an important chelating action for toxic metals as well.**

NAC acts through two mechanisms:

- **Intracellular “scavenger” of free radicals together with a slowdown of cellular apoptosis.**
- **Vasodilator action because of the association with nitric oxide causing an improvement of cerebral and peripheral function.**

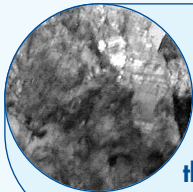
One of the most important preventive action in case of **Alzheimer and Parkinson’s diseases and atherosclerosis and cerebral ischemia** is fighting the oxidative stress affecting the brain.



### SELENIUM<sup>6</sup>

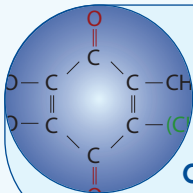
Selenium is an essential trace element for the glutathione peroxidase enzyme. It protects cells from environmental damages and pollution. It takes part in the metabolism of thyroid hormones (in particular TSH and T3. Their concentration diminishes during degenerative-cognitive or post-micro-ischemic processes).

**Various studies have shown that a Selenium deficit speeds up cognitive impairment, whereas supplementing Selenium improves the brain function in predisposed subjects.**



### MANGANESE<sup>7</sup>

Manganese is an essential mineral which carries out an **antioxidant action**. It plays an important role in the **superoxide dismutase (SOD) enzymatic system**. Moreover, it is **essential** for brain activity both in the **control of neurotransmitters** and in the **neuron use of glucose**. **A correct balance of the central nervous system depends on a good level of Manganese. A Manganese deficit reduces the dopamine levels.**



### COENZYME-Q<sub>10</sub><sup>7</sup>

It protects tissues and cells from hypoxia which occurs due to aging and cerebral ischemia.

**Q<sub>10</sub> synthesis begins to decrease gradually from 35-40 years of age: even different chronic pathologies and a long-term use of synthetic drugs (such as statins) can negatively influence Coenzyme Q<sub>10</sub> synthesis.**

**A wide list of publications show the beneficial effects of Coenzyme Q<sub>10</sub> against the onset of brain aging.**



### WITHANIA SOMNIFERA (ASHWAGANDHA)<sup>8-13</sup>

This plant is considered as **one of the most powerful natural adaptogens**; the biological and pharmacological effects of the root phytoextract must be ascribed to “withanolides”, i.e., steroidal molecules with a variety of pharmacological properties that help:

- **improve neuronal trophism to regenerate axon and dendritic endings**
- **protect the hippocampal structures, i.e., the seats of memory, through an antioxidant action**
- **modulate the acetylcholinesterase enzyme involving an increase of the synaptic impulse.**



### CAMELLIA SINENSIS (GREEN TEA)<sup>14</sup>

The green tea (*Camellia sinensis*) extract contained in **Guna®-Brain** is particularly rich in tannins, alkaloids, saponins, vitamins, minerals and trace elements carrying out:

- **an antioxidant action**
- **an anti-inflammatory action**
- **an hypocholesterolemic action**
- **a support action to the cardio-circulatory function.**

## BIBLIOGRAPHY

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## DIRECTIONS

### In case of:

- intensive mental fatigue
- intensive study
- intensive work
- emotional stress

### Adults:

2 tablets per day

### Children under 12 years of age:

1 tablet per day

### In case of:

- cognitive impairment
- TIA outcomes
- Alzheimer's disease
- Parkinson's disease

2 or more tablets per day as directed by your healthcare professional

We recommend you to take the tablets with half a glass of water on an empty stomach



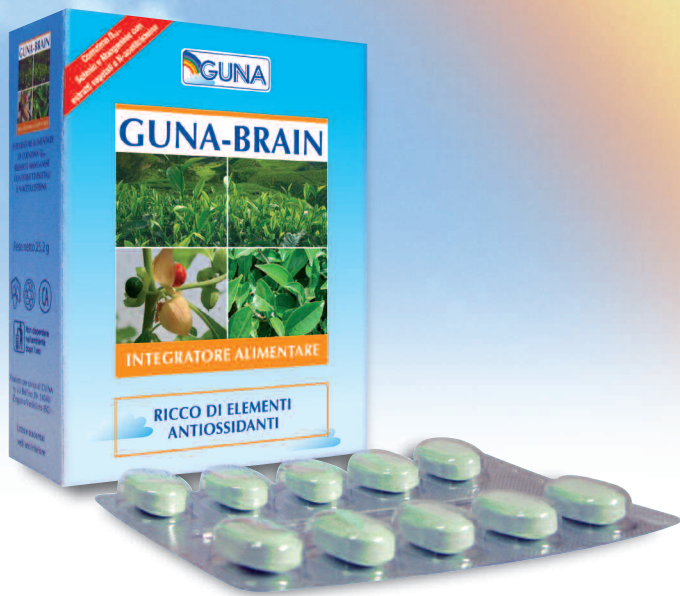
## GUNA®-BRAIN - Most common combinations as an adjuvant treatment to specific medical treatments

COMBINATIONS	DIRECTIONS
GUNA®-BRAIN + TRE SEI NOVE (OMEGA FORMULA)	Memory and cognitive functions impairment in patients suffering from atherosclerosis
GUNA®-BRAIN + ANTI AGE STRESS™	Memory and cognitive functions impairment in case of fatigue, mental or emotional stress
GUNA®-BRAIN + GUNA®-GERIATRICS	Memory and cognitive functions impairment in elderly patients
GUNA®-BRAIN + GUNA®-AWARENESS	Legasthenia and learning difficulties in pediatric age
GUNA®-BRAIN + GUNA®-TONIC	Chronic Stress Syndromes
GUNA®-BRAIN + GUNA®-GERIATRICS + GUNA®-CELL	Complementary treatment of TIA (Transit Ischemic Attack) outcomes
GUNA®-BRAIN + GUNA®-BASIC	Basic treatment of chronic degenerative pathologies affecting the CNS

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- PARIHAR M.S. et Al. - Susceptibility of hippocampus and cerebral cortex to oxidative damage in streptozotocin treated mice: prevention by extracts on Withania somnifera and Aloe vera. J Clin Neurosci.; **2004**. May;11(4):397-402.
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# Guna®-Brain

## Food Supplement



Average content per tablet	
Coenzyme Q <sub>10</sub>	20 mg
Selenium	50 mcg
Manganese	5 mg
N-acetylcysteine	250 mg
Green Tea dry extract	100 mg
Withania somnifera dry extract	100 mg

**KEY WORD:** Guna®-Brain, the synergic action of 6 active ingredients for a better mental efficiency

PROMOTES MEMORY AND COGNITIVE CAPACITIES

SLOWS DOWN PHYSIOLOGICAL BRAIN AGEING

### Ingredients

Inactive fillers: Microcrystalline cellulose, Calcium diphosphate; N-acetylcysteine, Green tea (*Camellia sinensis*, leaves) dry extract titrated 98% polyphenols (40% EGCG), *Withania somnifera* root dry extract titrated 5% withanolides; anti-agglomerating agents: cross-linked Sodium carboxymethyl cellulose, Magnesium stearate from vegetable sources, Silicon dioxide, Stearic acid from vegetable sources; Coenzyme Q<sub>10</sub>; Coating agent: Hydroxypropylmethylcellulose; Manganese carbonate; Stabilizer: Polyvinyl polypyrrolidone; Seleno-methionine; Colouring agents: Titanium dioxide, Copper chlorophyllin.

### Warnings

Keep the product in cool and dry place and protected from light. The expiry date refers to the product correctly stored in an unopened state. Do not exceed the recommended daily dose. Keep out of reach of children. Food supplements should not be used as a substitute for a varied and balanced diet and a healthy lifestyle.

Do not use if you are pregnant or breast-feeding. If you take psychoactive drugs please seek medical advice.

### Packaging

30 tablets. Net weight 25,2 g.



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