

Nourish the Mind: Nutrition for Mental Health.

Rehan Haider ^{1*}, Hina Abbas ², Shabana Naz Shah ³,

¹ Department of Pharmacy, University of Karachi, Pakistan.

² Fellow college of Physician and surgeon, Assistant professor, Department of Pathology Dow University of Health Sciences, Karachi, Pakistan.

³ Pharmaceutical chemistry, Faculty of Pharmacy, SBB Dewan university Karachi Pakistan.

Corresponding author: Rehan Haider, Department of Pharmacy, University of Karachi, Pakistan.

Received date: December 12, 2025; **Accepted date:** January 02, 2026; **Published date:** January 16, 2026

Citation: Rehan Haider, Hina Abbas, Shabana Naz Shah, (2026), Nourish the Mind: Nutrition for Mental Health, *J. Nutrition and Food Processing*, 9(1); DOI:10.31579/2637-8914/348

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Abstract:

The act of nutrition in asserting good innate strength is certainly important and influences neurochemical pathways, intellectual function, and poignant rule. This review covers digestive patterns, micronutrients, and mental strength consequences: accompanying a devoted effort to something depression, tension, and intellectual decline. Current evidence signifies that diets extreme in omega-3 fatty acids, B-vitamins, minerals, and antioxidants support neurotransmitter combination and reduce oxidative stress and inflammatory reactions involved in insane disorders. On the other hand, high consumption of extreme-treated meals, sugars, and saturated fats is associated with a higher risk of cavities and decreased intelligence. The verdicts of epidemiological studies and randomized regulated trials suggest that Mediterranean-style diets linked accompanying omega-3 and folate supplementation reduce airway inflammation and lower worry, and may also protect against cognitive deficits. Cross-divided and long mathematical reasonings highlight meaningful partnerships of food imperfections with insane energy disorders. There is again growing prominence in the controlled biography on the significance of the gut-brain axis, in what way diet-inferred microbiome changes impact desire and cognition. Basic studies manifest further that pertaining to food attacks concede the possibility of influencing serotonin, dopamine, and glutamate pathways, thus contributing to potential nutraceutical approaches for insane fitness. Despite promising results, a wide variety in study design, able to be consumed, and population traits demand further fine research to establish the origin and optimum able to can be consumed. Integration of nutritional actions into an insane well-being situation may yield economic, safeguard, and healing profits. Synthesizing current evidence, it identifies a few breaches and provides further guidance for future research in nutritional psychiatry.

Key words: nutritional understandings; mental health; concavity; tension; omega-3 fatty acids; b-vitamins

Introduction

Mental energy disorders influence millions of general, accompanying meaningful, friendly, and economic results [1]. In addition to being a global concern, even though pharmacological and psychotherapeutic interventions remain the main treatments, increasing evidence points to an important role of diet and food in insane health [3]. Nutrients containing omega-3 fatty acids, folate, a source of nourishment B12, metallic minerals, and antioxidants support neurotransmitter combining and dampen neuroinflammation, two together detracting processes organizing insane health [4-6]. On the other hand, diets usual of extreme unhealthy food and additional sugar consumption are guide raised risk of depression and deteriorated intellectual function [7,8]. Gaining awareness

of the nutritional cause of insane strength is critical in developing whole approaches that complement common medications [9].

Litterateur Review

Several studies further find that Mediterranean-style and vitamin-dense diets reduce the occurrence of cavities and anxiety [10-12]. Omega-3 fatty acids, specifically, EPA/DHA supplements, boost neuronal membrane fluidity and neurotransmission [13]. Folate and B12 inadequacies guide raised homocysteine, neurotoxicity, and mood disorders [14,15]. Antioxidants like source of nourishment C, E, and polyphenols humble oxidative stress in the brain [16,17]. The epidemiological reasoning also

suggests that the gut-mind axis can mediate digestive functions in understanding and conditions through microbiome interactions [18-20].

Research Methodology

A brochure search was conducted in PubMed, Scopus, and Web of Science for studies written between 2010–2025. The following keywords were secondhand: “food,” “insane energy,” “depression,” “worry,” and “understanding.” The code contained randomized controlled tests, discipline, and cross-divided studies accompanying clear dietary and

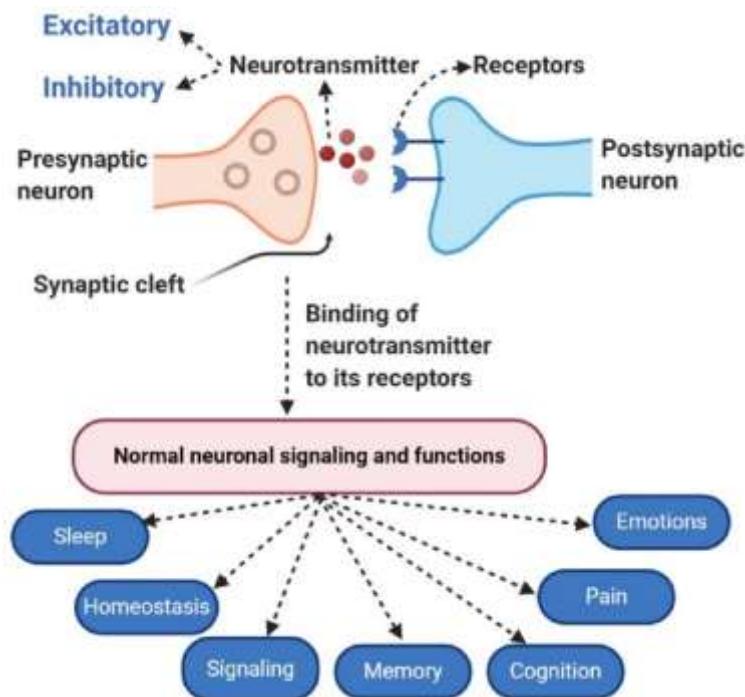
insane well-being effects. Analyses were conducted considering $p < 0.05$ as statistically significant.

Result

Analysis by subcategory surrendered agreeing findings for vitamin-thick diets displaying enhanced mood, lower levels of worry, and superior intellectual conduct. Intake of extreme sugar and processed food was guiding risk of concavity; higher intakes of essential fatty acids or B-source of nourishment supplements reasonably but considerably reduced depressive manifestations.

Table 1: Key Nutrients and Their Effects on Mental Health.

Nutrient	Mechanism of Action	Mental Health Benefits	Key References
Omega-3 Fatty Acids (EPA, DHA)	Enhance neuronal membrane fluidity; modulate neurotransmission	Improves mood, reduces depression and anxiety	13,21
Folate (Vitamin B9)	Lowers homocysteine; supports methylation reactions	Reduces depressive symptoms	14,24
Vitamin B12	Cofactor in neurotransmitter synthesis	Enhances cognition, reduces depression risk	15,24
Zinc	Modulates NMDA receptor activity; anti-inflammatory	Reduces anxiety, improves mood	5,16
Magnesium	Regulates NMDA and GABA receptors	Reduces anxiety and stress	5,16
Antioxidants (Vitamin C, E, Polyphenols)	Reduce oxidative stress in brain	Improves cognitive function; protects against neurodegeneration	16,17
Probiotics / Prebiotics	Modulate gut microbiota; influence gut-brain axis	Reduces anxiety and depressive symptoms	18–20



Source: created by Haider et al 2025.

Figure 1: Mechanistic Diagram: Nutrients → Neurotransmitters → Mental Health Outcomes.

Figure 2: Clinical Benefits of Vitamin B9 During Pregnancy.

Discussion

The judgments support the hypothesis that neurochemical, instigative, and oxidative pathways are complicated in what way or manner diet modulates insane health. Omega-3 fatty acids and B vitamins synergistically manage neurotransmitters, while antioxidants cool neuroinflammation. Gut microbiota timbre further contributes to the atmosphere timbre. Nevertheless, a variety of populations are substituted, able to be consumed in various orders, and outcome measures precisely limit the generalisability of the verdicts.

Conclusion

It shows a changeable factor that can greatly influence insane health. Nutrient-rich diets, in addition to intended supplementation, offer the possibility of supporting an adjunctive approach for reconstructing desire, lowering worry, and improving cognitive functioning. A future research plan involves testing standard interventions and long-term designs to ratify origin and ease recommendations.

Acknowledgment

The authors gratefully acknowledge the guidance of **Dr. Naweed Imam Syed**, Professor of Cell Biology at the University of Calgary, for his invaluable insights and mentorship throughout this work.

Authors' Contribution

All authors contributed to the conception, design, analysis, and writing of this manuscript. Each author reviewed and approved the final version for publication.

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DOI:[10.31579/2637-8914/348](https://doi.org/10.31579/2637-8914/348)

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