A MORE BALANCED YOU

SUPPORT A HEALTHIER INFLAMMATORY RESPONSE

Everyday life can challenge the body's natural inflammatory balance. Research suggests that molecular hydrogen (H_2) may help support a healthy inflammatory response at the cellular level.



OXIDATIVE STRESS SUPPORT

Cell and animal research suggests that molecular hydrogen may act as a selective antioxidant and influence cellular antioxidant responses. Two of the three sources are review articles.

VIEW STUDIES →



PRO-INFLAMMATORY CYTOKINE REGULATION

Animal studies and reviews have investigated how molecular hydrogen may influence inflammatory signaling and cytokine activity.

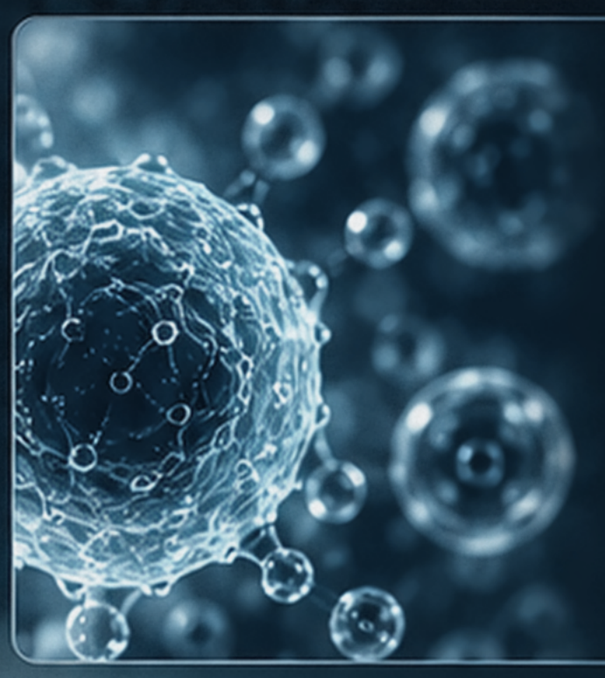
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ANTI-INFLAMMATORY CYTOKINE SUPPORT

In a guinea pig study, hydrogen-rich saline increased the anti-inflammatory cytokines IL-10 and TGF-beta. A rat study found more regulatory T cells, which is indirect evidence.

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EXCESSIVE INFLAMMATORY RESPONSE

This review of mostly animal sepsis research reports that hydrogen may reduce inflammatory factors. It is not a human clinical trial.

VIEW STUDIES →



These statements have not been evaluated by the Food and Drug Administration.
These products are not intended to diagnose, treat, cure, or prevent any disease.

RESEARCH REFERENCES

The published studies behind each topic on the previous page, grouped by topic. Select a title to open the publication.
Each entry notes the type of research.

01 OXIDATIVE STRESS SUPPORT

1 Hydrogen acts as a therapeutic antioxidant by selectively reducing cytotoxic oxygen radicals
Ohsawa et al. · Nature Medicine · 2007 · PMID 17486089
Cell and rat study · hydrogen gas inhalation

2 Oxidative Stress and Pathways of Molecular Hydrogen Effects in Medicine
Slezák et al. · Current Pharmaceutical Design · 2021 · PMID 32954996
Review article

3 Recent progress toward hydrogen medicine: potential of molecular hydrogen for preventive and therapeutic applications
Ohta · Current Pharmaceutical Design · 2011 · PMC3257754
Review article

02 PRO-INFLAMMATORY CYTOKINE REGULATION

4 Hydrogen, a Novel Therapeutic Molecule, Regulates Oxidative Stress, Inflammation, and Apoptosis
Tian et al. · Frontiers in Physiology · 2021 · PMID 34987419
Review article

5 Hydrogen protects lung from hypoxia/re-oxygenation injury by reducing hydroxyl radical production and inhibiting inflammatory responses
Chen et al. · Scientific Reports · 2018 · PMID 29789753
Mouse study · hydrogen gas inhalation

6 Molecular hydrogen downregulates acute exhaustive exercise-induced skeletal muscle damage
Nogueira et al. · Canadian Journal of Physiology and Pharmacology · 2020 · PMID 33356867
Rat study · hydrogen gas inhalation during exercise

7 Molecular hydrogen: a preventive and therapeutic medical gas for various diseases
Ge et al. · Oncotarget · 2017 · PMC5731988
Review article
Broad review of hydrogen research; cytokines are not its primary focus.

03 ANTI-INFLAMMATORY CYTOKINE SUPPORT

8 Neuroprotective Effect of Hydrogen-Rich Saline in Global Cerebral Ischemia/Reperfusion Rats: Up-Regulated Tregs and Down-Regulated miR-21, miR-210 and NF-κB Expression
Li et al. · Neurochemical Research · 2016 · PMID 27386874
Rat study · hydrogen-rich saline injection
Indirect evidence: measured regulatory T cells, not anti-inflammatory cytokines directly.

9 Hydrogen-Rich Saline Ameliorates Allergic Rhinitis by Reversing the Imbalance of Th1/Th2 and Up-Regulation of CD4+CD25+Foxp3+ Regulatory T Cells, Interleukin-10, and Membrane-Bound Transforming Growth Factor-β in Guinea Pigs
Xu et al. · Inflammation · 2018 · PMID 28894978
Guinea pig study · hydrogen-rich saline · measured IL-10 and TGF-β directly

04 EXCESSIVE INFLAMMATORY RESPONSE

10 Molecular Hydrogen Therapy Ameliorates Organ Damage Induced by Sepsis
Zheng & Zhu · Oxidative Medicine and Cellular Longevity · 2016 · PMC4931094
Review article, mostly animal research · not a human clinical trial



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