

SAFE PASSAGE

Addressing Crew Health Operations Missions



2008
2002

WHO WE ARE:

- A private, non-profit organization
- Established in 1970, under 1863 Congressional charter of NAS
- A component of the National Academy of Sciences
- We advise the nation issues of health and medical policy
- Majority of studies are requested and funded by the federal government
- Study committees are composed of experts serving pro-bono

A TYPICAL YEAR

- IOM's research program is about \$25 million per year
- At any given time, IOM has about 70 to 80 activities underway
- IOM publishes about 40 reports annually through the National Academy Press

POLICY

A definite course or method of action selected from among alternatives and in light of given conditions to guide and determine present and future decisions.

- Webster's Collegiate Dictionary

IOM STUDIES ISSUES SUCH AS:

- Are pesticide residues in food harmful to children?
- What nutrients does the body need to prevent deficiency and protect us from disease? And at what level?
- Are silicone breast implants safe?
- What proportion of disease and deaths are due to lifestyle?
- What's the best system for investing scarce resources in vaccine development?

MORE STUDIES...

- The Future of Public Health
- The Human Genome Project
- Allocation of organs for transplantation
- Medical errors

Background

- Origin: NASA request
- Sponsor: NASA
- Funding: \$1.4 million/ 24 months
- Staff: Charlie Evans, Mel Worth, Judy Rensberger, Tanya Lee

Purpose

To conduct an assessment of the current status of scientific knowledge; evaluate the most promising directions for the future of space medicine scientific progress, recommend a national and international strategy for space medical care during long term space flight, and suggest the most effective ways for NASA to address priority areas in achieving this strategy.

Creating a Vision for Space Medicine During Travel Beyond Earth Orbit

Committee Information

- Chair: John Ball, M.D., J.D.
- 14 member committee
- Academy Membership: 3 IOM Members
- Board Liaison: Gloria Sarto

Status

Committee Formation	Meetings and Report Writing	Report Review	Book Publication
August 1999	October 1999	February 2001	May 2001 (Release) July 2001

RECOMMENDATIONS

- **Recommendation 1. NASA should give increased priority to understanding, mitigating, and communicating to the public the health risks of long-duration missions beyond Earth orbit.**
- **Recommendation 2. NASA should develop a comprehensive health care system for astronauts for the purpose of collecting and analyzing data while providing the full continuum of health care to ensure astronaut health.**

RECOMMENDATIONS (Cont.)

- **Recommendation 3. NASA should develop a strategic health care research plan de-signed to increase the knowledge base about the risks to astronaut health.**
- **Recommendation 4. NASA should give priority to increasing the knowledge base of the effects of living conditions and behavioral interactions on the health and performance of astronauts on long-duration space missions.**
- **Recommendation 5. NASA should develop and use an occupational health model for the collection and analysis of astronaut health data, giving priority to the creation and maintenance of a safe work environment.**

RECOMMENDATIONS (Cont.)

- **Recommendation 6. NASA should accelerate integration of its engineering and health sciences cultures.**
- **Recommendation 7. NASA should establish an organizational component headed by an official who has authority over and accountability for all aspects of astronaut health, including appropriate policy-making, operational, and budgetary authority.**