

MARCH/APRIL 2018 | MIND.SCIENTIFICAMERICAN.COM

SCIENTIFIC AMERICAN **MIND**

BEHAVIOR • BRAIN SCIENCE • INSIGHTS

The Brain, Decoded

A cryptography-inspired
strategy translates neural
signals into movement



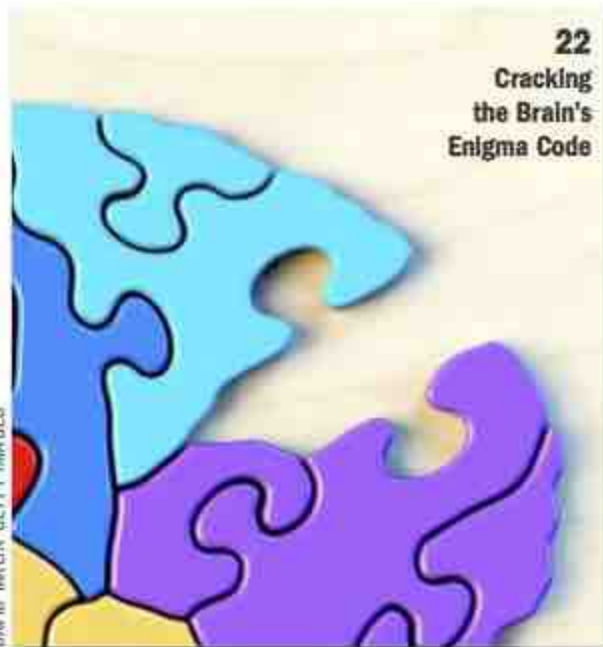
The downside of being smart • Improve your sleep • Buy without regret



15
Parents in a Remote Amazon Village Barely Talk to Their Babies—and the Kids Are Fine



18
Social Networking: Is Generation Smartphone Really More Prone to Unhappiness?



22
Cracking the Brain's Enigma Code

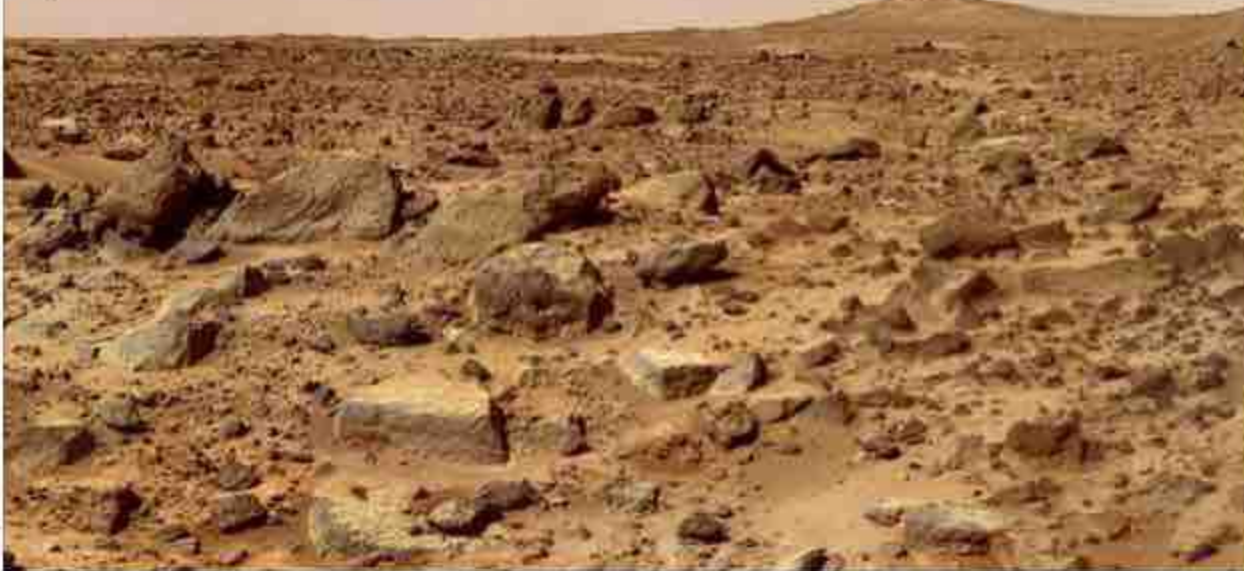
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 New findings suggest it is more complicated than scientists thought
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 Superior IQs are associated with mental and physical disorders, research suggests
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 Ignoring a Western child-rearing practice does not seem to matter for the Tsimané of Bolivia
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 A study closely correlates device use with depression and suicide, but the link is contentious

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 Neuroscientists are taking cues from cryptography to translate brain activity into movements
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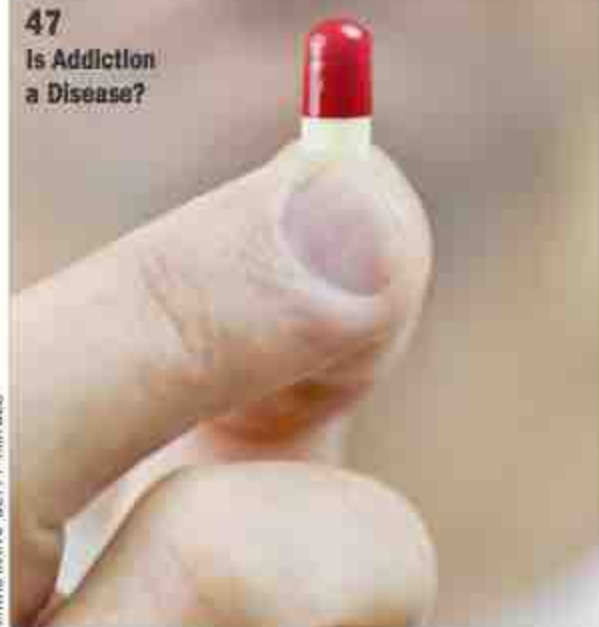
NASA/JPL

40 Do Sexual Harassment Prevention Trainings Really Work?



MIHAI SURDU UNSPLASH

47 Is Addiction a Disease?



MIKRO MANG GETTY IMAGES

28 The Importance of Fostering Emotional Diversity in Boys

Boys grow up in a world inhabited by a narrower range of emotions

31 My Year on "Mars"

Physicist Christiane Heinicke spent 365 days sequestered with five others in a geodesic dome on the side of a Hawaiian volcano to test what isolation might do to the psyches of the crew on a Mars mission

Sidebar: The Right Stuff in Space

A successful Mars mission requires that the crew can collaborate under severe stress. Psychologist Dietrich Manzey knows how to avoid strife in outer space

Opinion

40 Do Sexual Harassment Prevention Trainings Really Work?

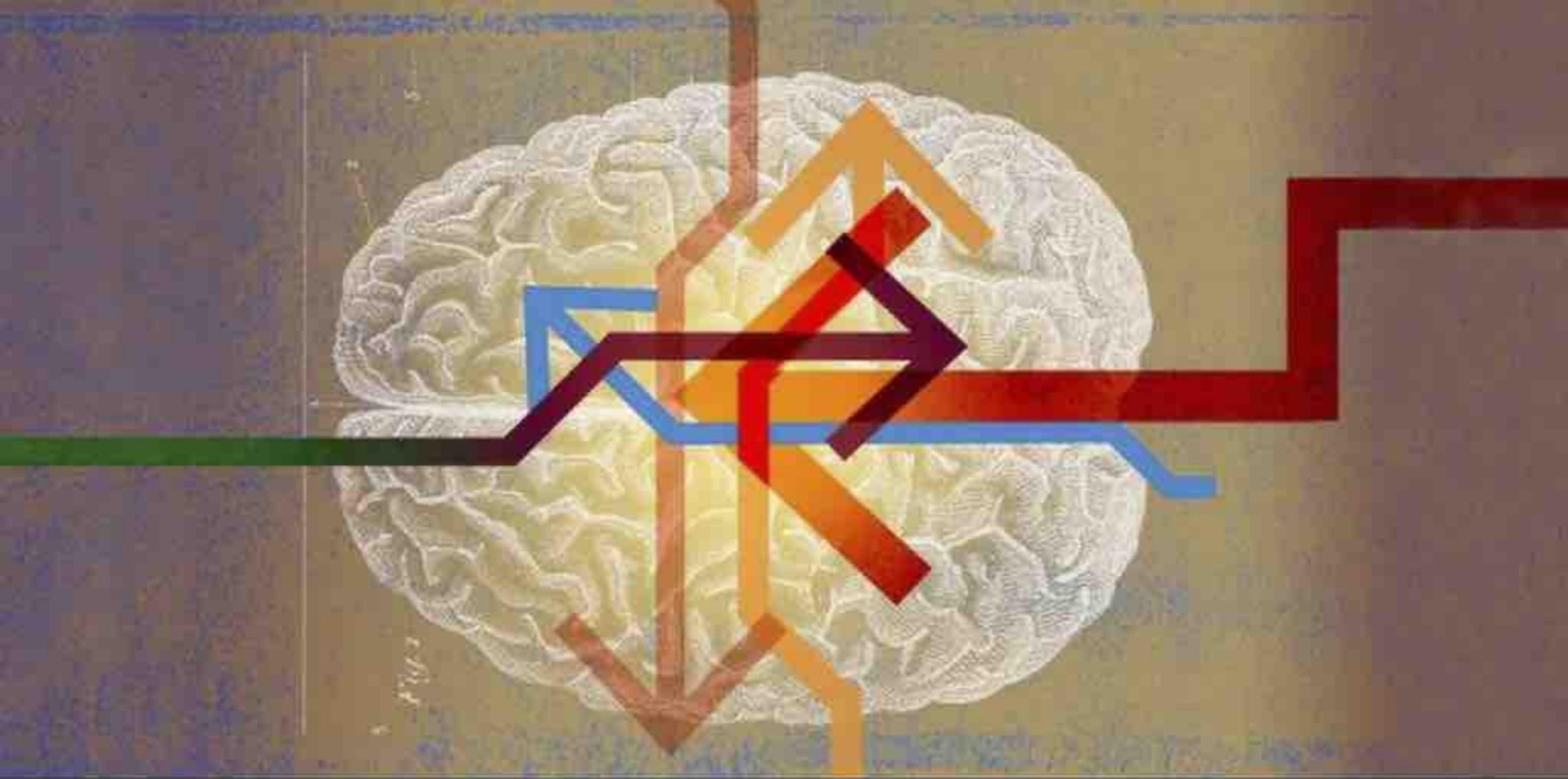
Remarkably little research has been performed on the effectiveness of employers' efforts to raise awareness

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Follow the millennial generation's four golden rules of personal finance

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The current medical consensus about addiction may very well be wrong



NEWS

The Neuroscience of Changing Your Mind

New findings suggest it is more complicated than scientists thought



NEWS

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NEWS

Bad News for the Highly Intelligent

Superior IQs are associated with mental and physical disorders, research suggests



Baby sleeping in a hammock
in the Tsimané settlement of Anachere,
in the Amazon rainforest.

NEWS

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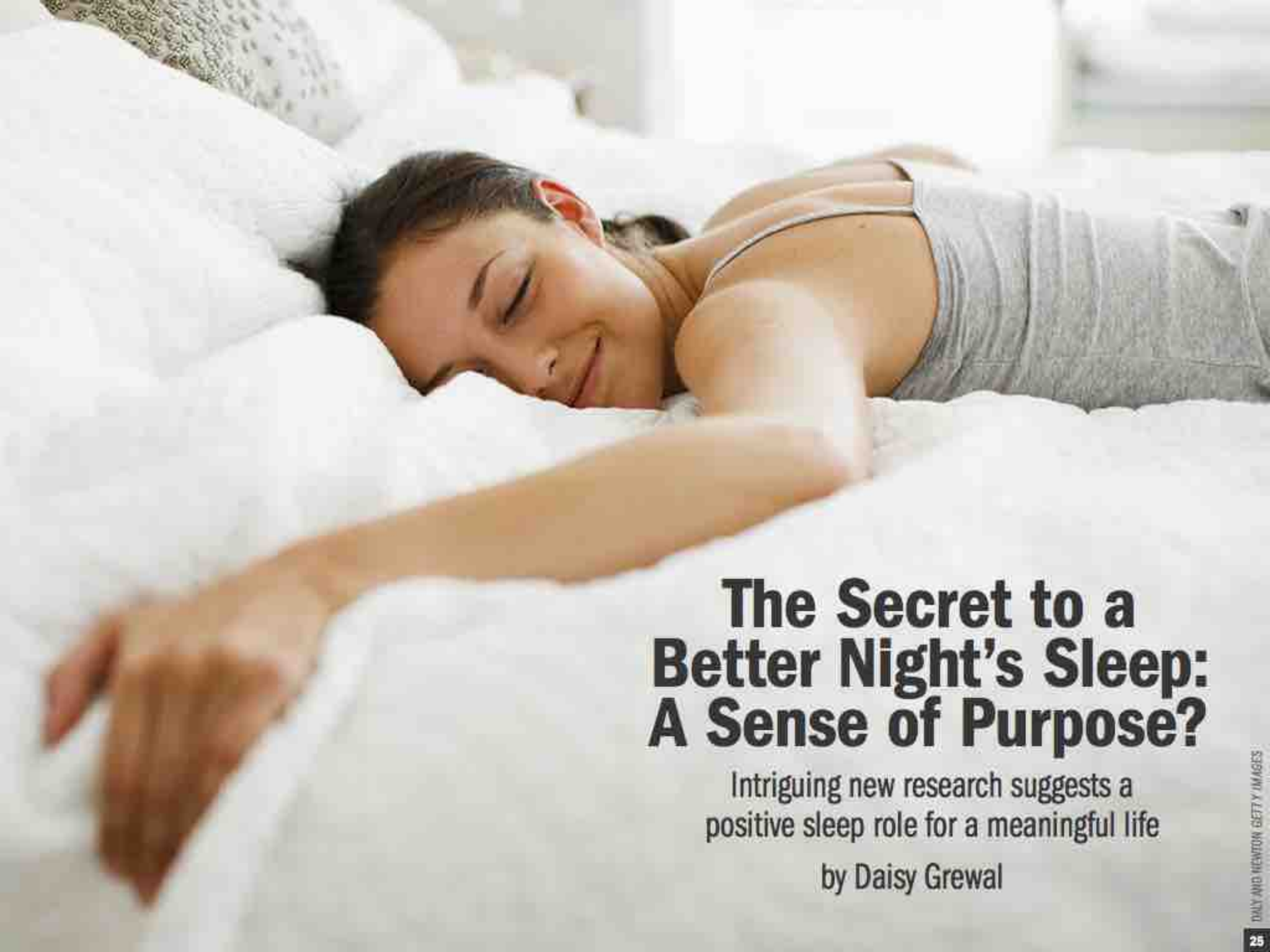
A study closely correlates device use with depression and suicide, but the link is contentious



Cracking the Brain's Enigma Code

Neuroscientists are taking cues from cryptography to translate brain activity into movements

by Helen Shen



The Secret to a Better Night's Sleep: A Sense of Purpose?

Intriguing new research suggests a positive sleep role for a meaningful life

by Daisy Grewal

A young boy with dark hair is shown in profile, looking downwards. An adult's hand is visible, gently touching his shoulder. The background is a soft, light blue gradient.

The Importance of Fostering Emotional Diversity in Boys

Boys grow up in a world inhabited by a narrower range of emotions

By June Gruber and Jessica L. Borelli

A person in a full space suit, including a helmet with a dark visor, stands in a vast, arid desert landscape. The background shows a hazy, orange-tinted sky and distant, low mountains. The person is wearing a dark suit with light-colored straps and gloves. The overall mood is one of isolation and exploration.

My Year on “Mars”

Physicist Christiane Heinicke spent 365 days sequestered with five others in a geodesic dome on the side of a Hawaiian volcano to test what isolation might do to the psyches of the crew on a Mars mission

By Christiane Heinicke



OPINION

How to Avoid “Purchase Regret”

Follow the millennial generation's four golden rules of personal finance

By Conor Artman,
Joseph Sherlock and
Dan Ariely



OPINION

Is Addiction a Disease?

The current medical
consensus about addiction
may very well be wrong

By Elly Vintiadis