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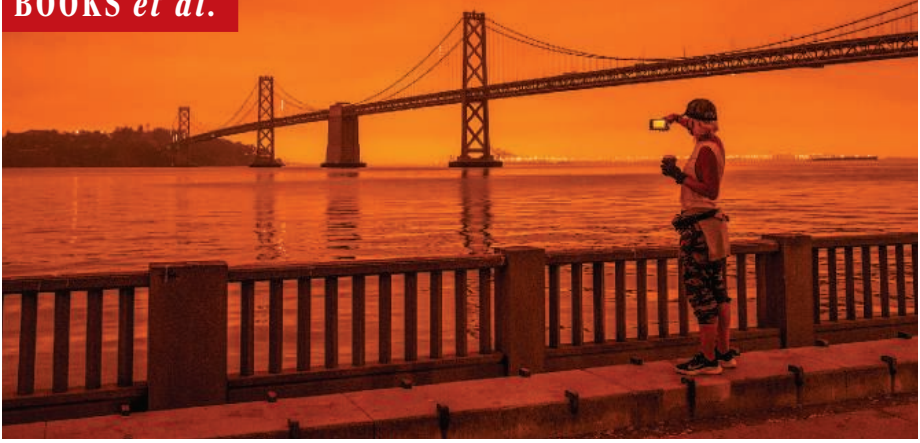
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CLIMATE CHANGE

American climate migration

Increasingly inhospitable conditions will change the nation's demography, argues a journalist

By **Miriam R. Aczel**^{1,2} and **Michàlle E. Mor Barak**³

Currently, less than 1% of Earth is too hot to support human life, but researchers estimate that by 2070 nearly 20% of the planet's surface will be outside humanity's comfort zone. The "bubble of unlivability" could include up to a third of the people on Earth, and existing inequalities will likely increase conflict. In the United States, vulnerable populations will be prone to disproportionate risk.

On the Move, by journalist Abrahm Lustgarten, is a poignant and meticulously researched exploration of climate change and both its imminent and long-term effects on human migration in the US. Through analysis, personal narratives, and projected future scenarios, Lustgarten unveils the stark reality of a world on the brink of massive demographic shifts driven by an increasingly inhospitable climate.

Lustgarten begins with a personal account of the moment he recognized the climate crisis as a reality that no region will escape. His usual view of the San Francisco skyline was re-

placed by "a sepia-toned, smoke-filled universe," he writes. "Just twelve miles away as the crow flies, behind the ridge of parched and brittle redwoods I could see from my window, the Point Reyes National Seashore was burning. Tall gray towers of smoke billowed upward, raining down soot." He then details how climate-driven migrations are not a future possibility but rather a current event, with historical precedents and emerging patterns that signal a profound shift in how and where people can live.



On the Move: The Overheating Earth and the Uprooting of America
Abrahm Lustgarten
Farrar, Straus and Giroux, 2024. 336 pp.

Lustgarten predicts that Americans will see an influx of migrants from the south and will experience considerable internal migration as well. Increasingly frequent and severe wildfires, extreme weather patterns, and sea level rise will make some areas uninhabitable. "The poorest neighborhoods—many of them predominantly Black and Latinx—are in the lowest-lying areas, and they will suffer first," he observes.

The book begins with an analysis of climate change pressures, providing a glimpse into what life might look like within several decades. Here, Lustgarten highlights the risks many Americans have unknowingly accepted by living in vulnerable areas and how economic policies have exacerbated these risks.

In subsequent chapters, Lustgarten projects the demographic shifts that are likely to occur within the United States. These include coastal residents moving

inland because of rising sea levels and hurricanes, as well as migration from the drought-stricken Midwest to regions with stable water sources.

Economic disparities will grow as wealthier people relocate to climate-resilient areas, Lustgarten writes, while the urban poor will face increased hazards. Urban-rural migration patterns may reverse, and large interstate migrations are expected from states such as California, Texas, and Florida to the Pacific Northwest and Northeast, potentially reshaping political landscapes.

Lustgarten references a 2017 study estimating that climate change could cost the US about 1.2% of its gross domestic product per 1°C of global warming, rising to a 4% loss by century's end—a total of around \$9.3 trillion in lost productivity per decade (*J*). But this figure, he notes, "conceals the researchers' most important finding: far more devastating loss is in store for the hottest and driest parts of the South." "In the poorest places the tally for climate damages could add up to nearly 19 percent of their per capita income each year," he adds.

The book concludes on a note of cautious optimism, emphasizing that the severity of climate change impacts, including the scale of migration, can still be mitigated through major and immediate actions to reduce emissions and adapt to the changes that are already here. "Catastrophe is not inevitable," Lustgarten writes. "Its arrival or severity depends on how quickly the world can slow or even halt emissions, and then on the actions that humanity and our government leaders take to prepare for the change that will come anyway."

On the Move is a compelling call to understand, prepare for, and act on the climate crisis. It challenges readers to confront the reality of what is coming and to consider the role each of us plays in shaping the future. Combining rigorous research and engaging storytelling, Lustgarten provides a framework for navigating the uncertain terrain of a warming world.

Amid the growing body of literature on climate change, Lustgarten's book provides a crucial examination of the impacts—realized and projected—in our own backyards and how these changes are remaking society. Importantly, it is both a call to action and a blueprint for how to weather the coming storm, highlighting historical injustices and charting an equitable path forward. ■

REFERENCES AND NOTES

1. S. Hsiang *et al.*, *Science* **356**, 1362 (2017).

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