

## Climate change making life worse in Liberia, but only half of citizens have heard of it

Afrobarometer Dispatch No. 268 | Taa Wongbe and Marvin Samuel

### Summary

Scientists and policy makers have clearly recognized the threat that climate change poses to Liberia, particularly to its seven in 10 citizens who depend on agriculture for their livelihood (Stanturf, Goodrick, Warren, Stegall, & Williams, 2013; USAID, 2012). Severe flooding experienced in recent years, changes in rainfall patterns, increased temperatures, and other climate changes have serious implications for food security but also for health, education, and other development sectors (Kenneh & Greaves, 2016; Daily Observer, 2018).

Confronting this threat, the government has developed a National Policy and Response Strategy on Climate Change that streamlines climate-change issues and prioritizes mitigation strategies in key development planning processes (Republic of Liberia, 2018). It includes monitoring systems to detect changes that will affect agricultural production. In launching the strategy, Liberia's finance minister noted that without a coherent national response, climate change could reverse decades of development gains and impede progress toward achievement the UN Sustainable Development Goals (Daily Observer, 2018).

Despite these efforts, a recent Afrobarometer survey shows that only slightly more than half of Liberians have heard of climate change. Among those who have, a majority say it is making life worse in Liberia, but many are not aware of its causes and see no role for average citizens in helping to stop it.

### Afrobarometer survey

Afrobarometer is a pan-African, non-partisan research network that conducts public attitude surveys on democracy, governance, economic conditions, and related issues in African countries. Six rounds of surveys were conducted in up to 37 countries between 1999 and 2015, and Round 7 surveys were completed in 2018. Afrobarometer conducts face-to-face interviews in the language of the respondent's choice with nationally representative samples.

The Afrobarometer team in Liberia, led by The Khana Group, interviewed 1,200 adult Liberians in June 2018. A sample of this size yields country-level results with a margin of error of +/-3 percentage points at a 95% confidence level. Previous surveys have been conducted in Liberia in 2008, 2012, and 2015.

### Key findings

- More than four in 10 Liberians (44%) say climate conditions for agricultural production in their area have gotten "worse" or "much worse" over the past 10 years.
- A similar proportion (43%) say flooding has become "somewhat more severe" or "much more severe" over the past decade. Only one-quarter (27%) say droughts have become more severe.

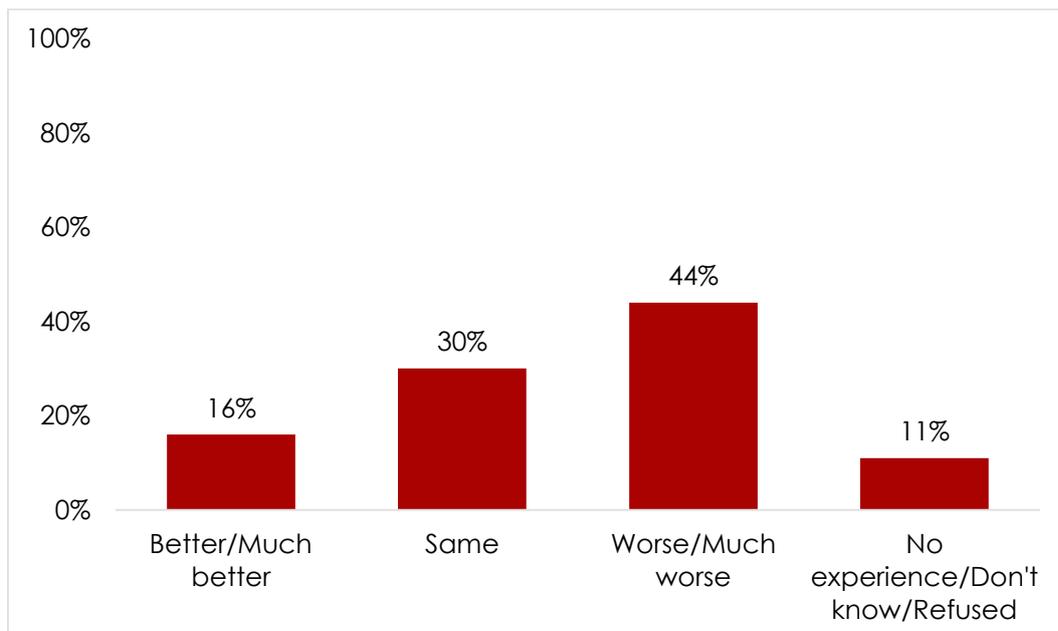
- A slim majority (54%) of Liberians say they have heard of climate change; almost half (46%) have not.
- Awareness of climate change is particularly low among the uneducated, youth, women, and rural residents.
- Among Liberians who have heard of climate change:
  - Only half (49%) believe it is caused by human activity, while 42% attribute it to natural processes.
  - Six in 10 (61%) say it is making life in Liberia “somewhat worse” or “much worse.”
  - Only about one-fourth say ordinary people can do “a little” (19%) or “a lot” (8%) to stop climate change. Half (50%) say climate change doesn’t need to be stopped.

### Climate conditions and agricultural production

Liberia has two climate regimes – an equatorial climate with year-round rainfall in the South and a tropical regime with rainy and dry seasons in the rest of the country (Stanturf et al., 2013). In recent years, some researchers have pointed to increased temperatures and changes in rainfall patterns as having negative effects on agriculture (Kenneh & Greaves, 2016).

More than four in 10 Liberians (44%) say climate conditions for agricultural production have gotten “worse” or “much worse” over the past 10 years – almost three times as many as perceive them as having improved (16%). Three in 10 (30%) say climate conditions have not changed over the past decade (Figure 1).

**Figure 1: Climate conditions for agricultural production | Liberia | 2018**

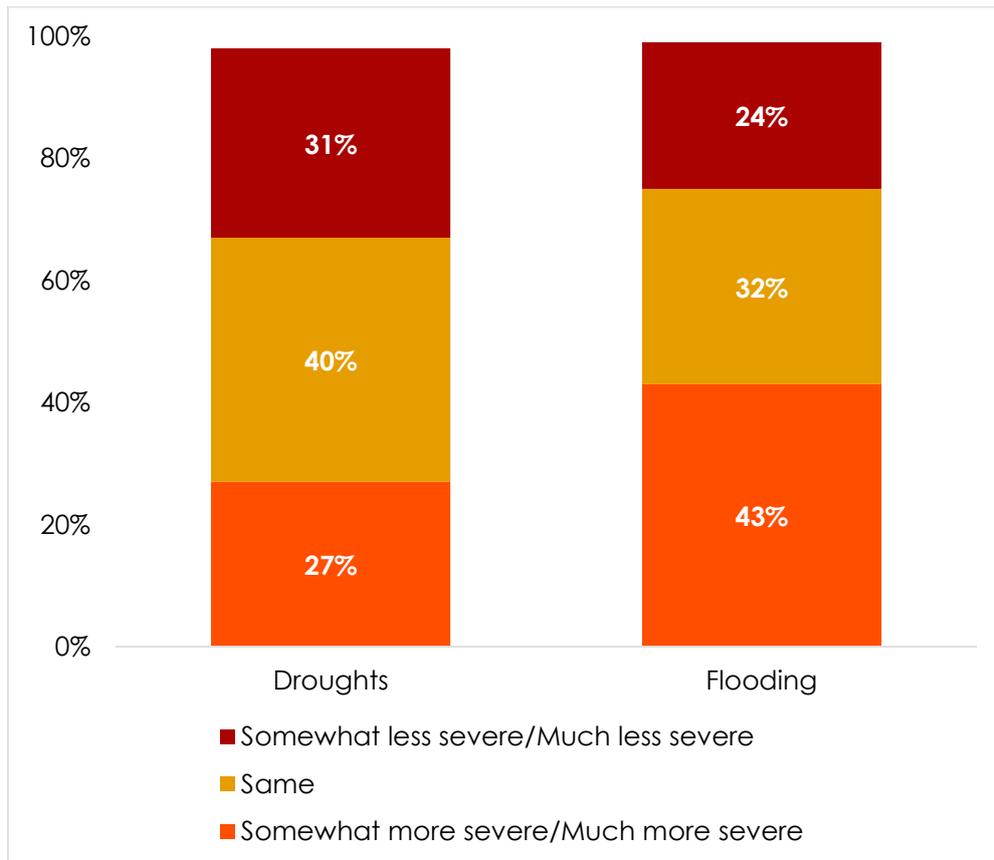


**Respondents were asked:** *In your experience, would you say climate conditions for agricultural production in your area have gotten better, gotten worse, or stayed about the same over the last 10 years, or haven't you heard enough to say?*

More than four in 10 Liberians (43%) say flooding has become “somewhat more severe” or “much more severe” in the past 10 years, while a quarter (23%) say it has become less severe (Figure 2).

On the other hand, only about a quarter (27%) of respondents say that droughts have become “somewhat more severe” or “much more severe” over the past decade. Four in 10 (40%) say droughts have remained the same, while three in 10 (30%) say they have gotten less severe.

**Figure 2: Severity of droughts and flooding | Liberia | 2018**

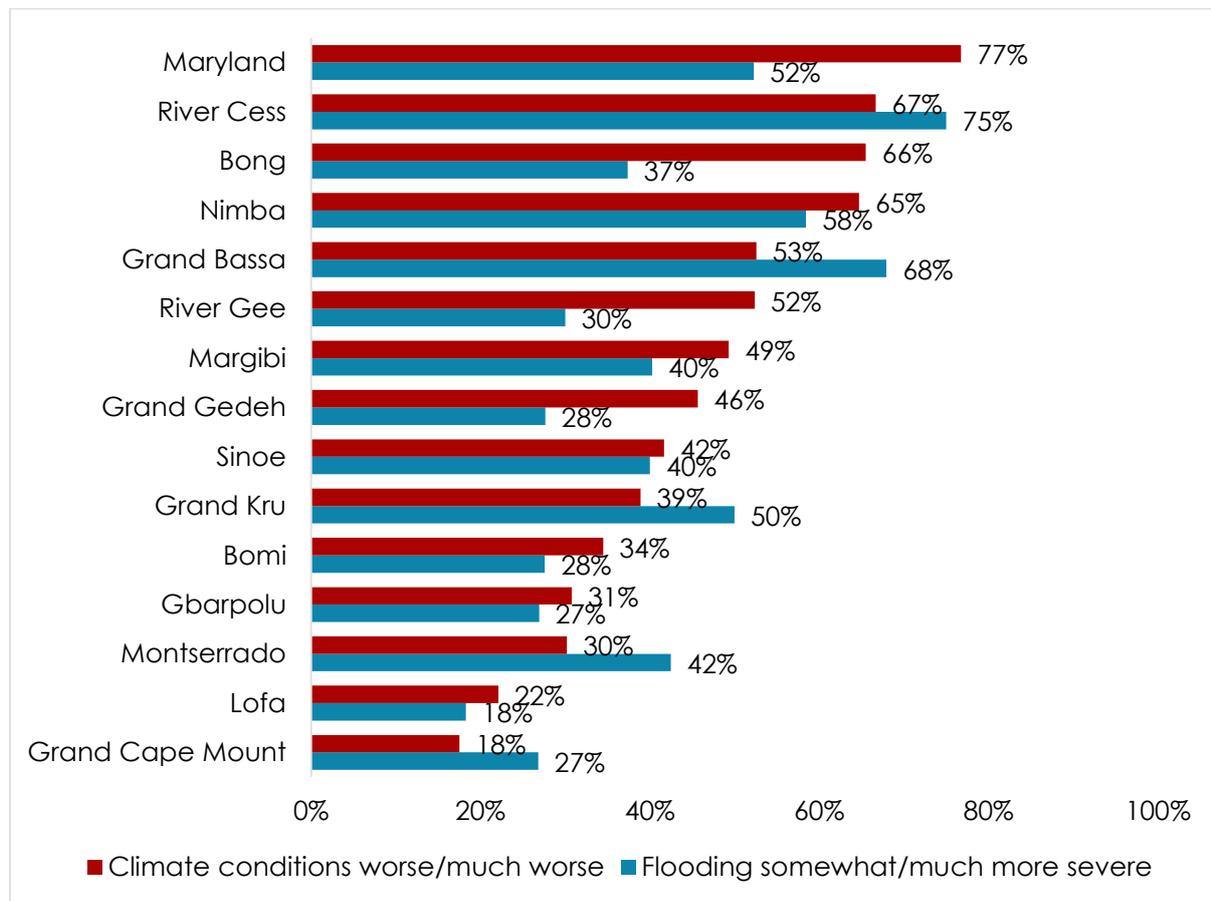


**Respondents were asked:** In your experience, over the past 10 years, has there been any change in the severity of the following events in the area where you live? Have they become more severe, less severe, or stayed about the same?

Perceptions of changes in climate conditions vary considerably by county.<sup>1</sup> Large majorities see conditions for agricultural production as having deteriorated in Maryland (77%), River Cess (67%), Bong (66%), and Nimba (65%), compared to only about one in five residents in Grand Cape Mount (18%) and Lofa (22%) in the northwestern part of the country (Figure 3). Counties where majorities of citizens complain of worsening flooding include River Cess (75%), Grand Bassa (68%), and Nimba (58%) in the central part of the country.

<sup>1</sup> Reflecting their share of Liberia’s total population, small sample sizes in many counties outside Montserrado, Nimba, and Bong produce results with large margins of error. County-level results should be considered purely suggestive.

**Figure 3: Worsened climate conditions | by county | Liberia | 2018**



**Respondents were asked:**

- In your experience, would you say climate conditions for agricultural production in your area have gotten better, gotten worse, or stayed about the same over the last 10 years, or haven't you heard enough to say?
- In your experience, over the past 10 years, has there been any change in the severity of the following events in the area where you live: Floods? Have they become more severe, less severe, or stayed about the same?

**Knowledge of climate change**

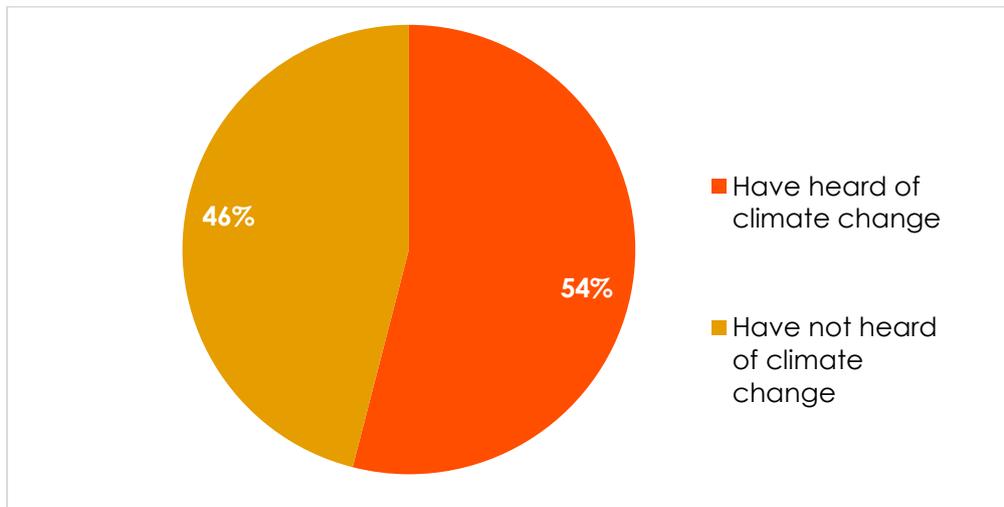
While some Liberians have observed changes in climate conditions, just slightly more than half (54%) say they have heard of climate change (Figure 4).

As might be expected, awareness of climate change increases with respondents' level of education: Citizens with post-secondary qualifications are four times as likely to have heard of climate change as those with no formal education (88% vs. 22%) (Figure 5). Similarly, more men (67%) than women (41%) have heard of climate change, and urban residents (57%) are slightly more aware of climate change than their rural counterparts (52%).

Perhaps surprisingly, youth are less aware of climate change than their elders: 52% of those aged 18-35 years, compared to 57% of middle-aged respondents and 60% of those aged 56 years and above.

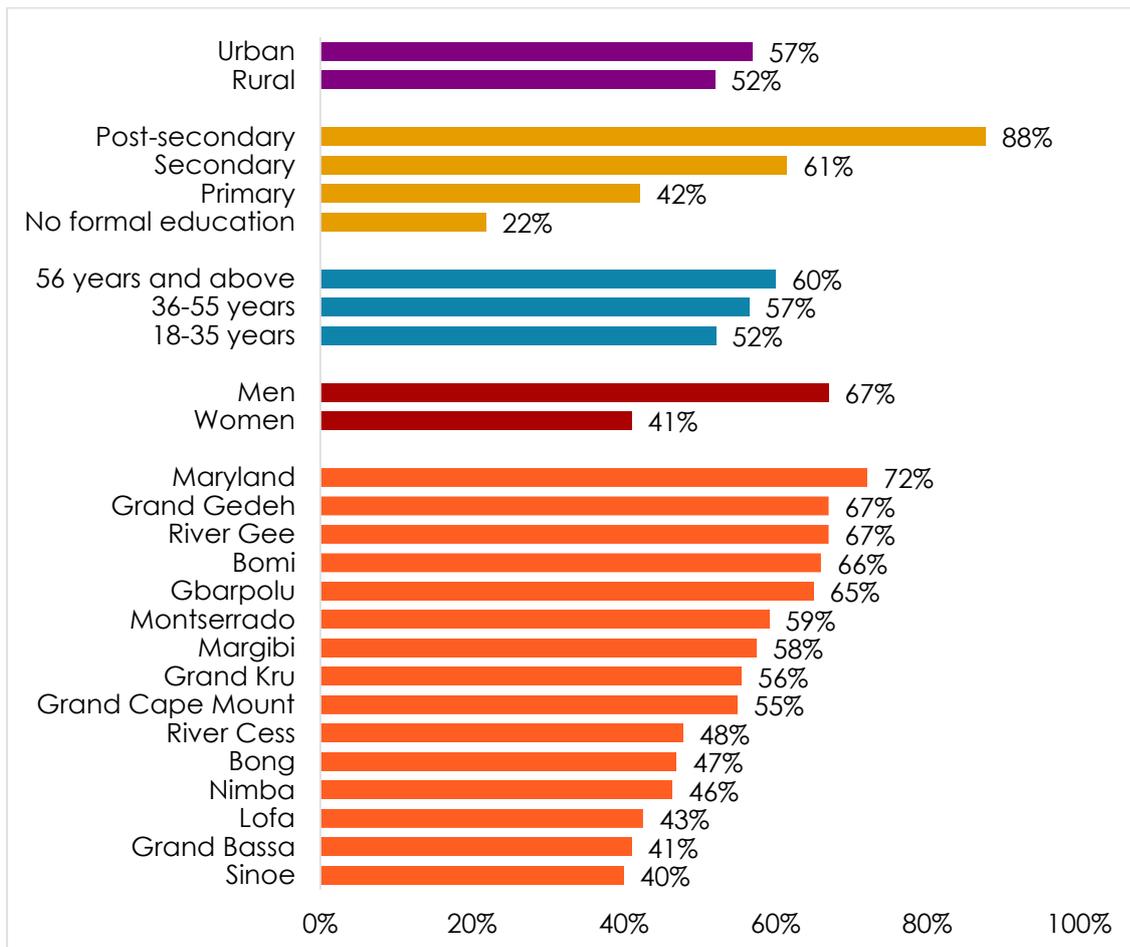
Knowledge of climate change differs greatly by county. About seven in 10 residents of Maryland (72%), Grand Gedeh (67%), River Gee (67%), and Bomi (66%) say they have heard of climate change, compared to just four in 10 residents of Sinoe (40%), Grand Bassa (41%), and Lofa (43%).

**Figure 4: Awareness of climate change | Liberia | 2018**



**Respondents were asked:** *Have you heard about climate change, or haven't you had the chance to hear about this yet?*

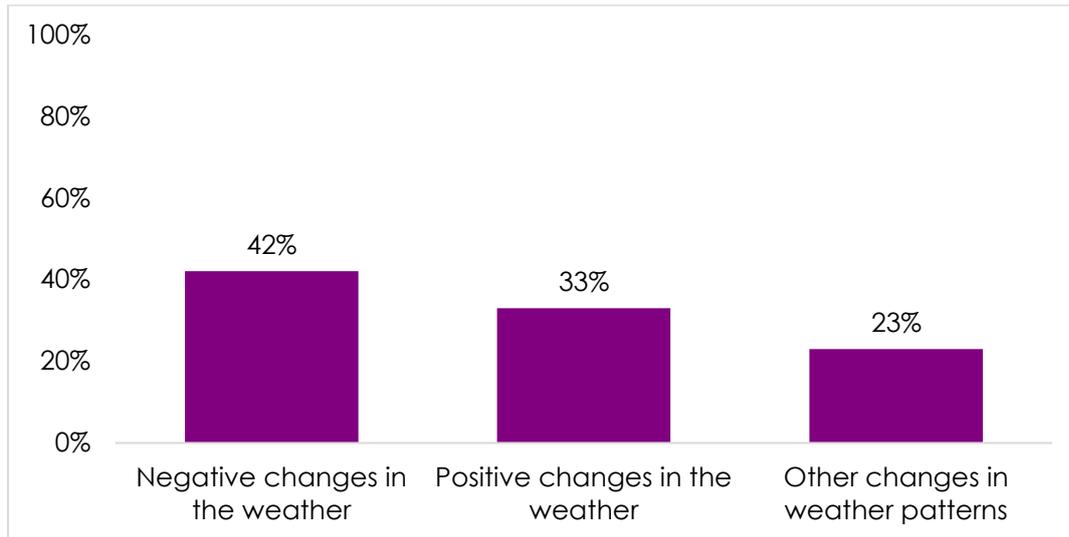
**Figure 5: Awareness of climate change | by socio-demographic group | Liberia | 2018**



**Respondents were asked:** *Have you heard about climate change, or haven't you had the chance to hear about this yet? (% who say they have heard of climate change)*

Among those who have heard of climate change, fewer than half (42%) understand it as negative changes in the weather such as more droughts, floods, or extreme heat, while one-third (33%) think it refers to positive changes in the weather such as better rainfall patterns or longer growing seasons, and 23% define it as other changes in weather patterns (Figure 6).

**Figure 6: Meaning of “climate change” | Liberia | 2018**

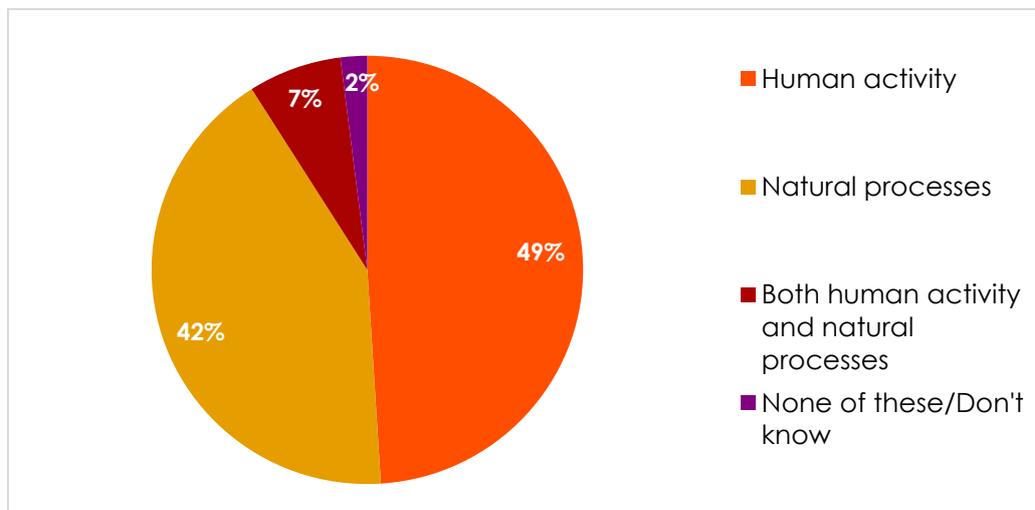


**Respondents who said they had heard about climate change were asked:** What does “climate change” mean to you? (Note: Figure excludes respondents who said they had not heard about climate change.)

### Cause, effects, and mitigation of climate change

While most scientists attribute climate change to human activity, such as burning fossil fuels, only half (49%) of Liberians who have heard of climate change identify human activity as its main cause (Figure 7). Almost as many (42%) believe that climate change is caused by natural processes.

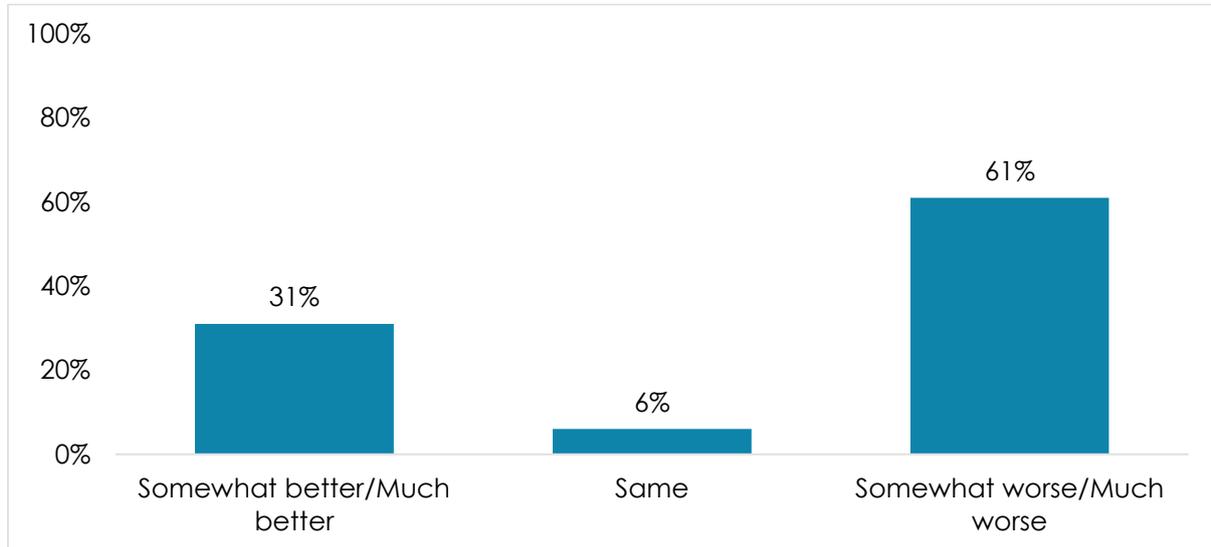
**Figure 7: Main cause of climate change | Liberia | 2018**



**Respondents who said they had heard about climate change were asked:** Which of the following do you think is the main cause of climate change, or haven't you heard enough to say? (Note: Figure excludes respondents who said they had not heard about climate change.)

As for the effects of climate change, six out of 10 Liberians (61%) who have heard of climate change say it is making life in Liberia “somewhat worse” or “much worse.” About three in 10 (31%) say climate change is making their lives better (Figure 8).

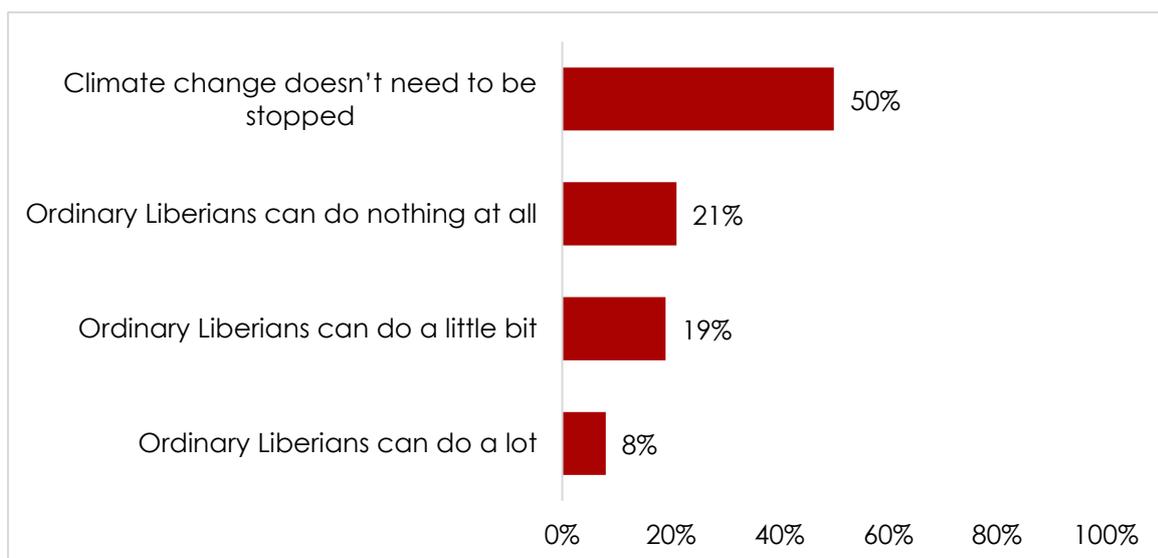
**Figure 8: Is climate change making life better or worse? | Liberia | 2018**



**Respondents who said they had heard about climate change were asked:** Do you think climate change is making life in Liberia better or worse, or haven't you heard enough to say? (Note: Figure excludes respondents who said they had not heard about climate change.)

In spite of its perceived toll on life quality, half (50%) of Liberians say climate change does not need to be stopped (Figure 9). Only about one-fourth believe that ordinary Liberians can do “a little bit” (19%) or “a lot” (8%) to stop it, while one-fifth (21%) say ordinary citizens can't do anything to help stop it.

**Figure 9: Stopping climate change | Liberia | 2018**



**Respondents who said they had heard about climate change were asked:** Do you think that climate change needs to be stopped? [If yes:] How much do you think that ordinary Liberians can do to stop climate change? (Note: Figure excludes respondents who said they had not heard about climate change.)

## Conclusion

Despite the threat it represents to food security and other sectors, only half of Liberians have heard of climate change. Youth, women, rural residents, and citizens with little formal education are particularly likely to be unaware of climate change – obvious target audiences for information campaigns by government, the media, and civil society. But even among Liberians who have heard of climate change, many do not know that it's caused by human activity, and most see no role for themselves in helping to stop it. While the government has launched initiatives to reduce the vulnerabilities of agricultural systems to climate change, much more can be done to engage the Liberian citizenry in preparing for, mitigating, and advocating for policies to end climate change.

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## References

- Daily Observer. (2018). Liberia remains vulnerable to climate change.  
<https://www.liberianobserver.com/news/liberia-remains-vulnerable-to-climate-change/>.
- Kenneh, A. S., & Greaves, E. Z. (2016). The effects of climate change on the farming seasons in Liberia. <https://meas.illinois.edu/wp-content/uploads/2016/03/Greaves-Edmord-and-Kenneh-Aaron-2016-Presentation-Effects-of-Climate-Change-in-Liberia.pdf>.
- Republic of Liberia. (2018). National policy and response strategy on climate change.  
[http://www.epa.gov.lr/sites/default/files/National%20Policy%20and%20Response%20Strategy%20on%20Climate%20Change%20Final%20Document-min\\_0.pdf](http://www.epa.gov.lr/sites/default/files/National%20Policy%20and%20Response%20Strategy%20on%20Climate%20Change%20Final%20Document-min_0.pdf).
- Stanturf, J. A., Goodrick, S., Warren, M., Stegall, C., & Williams, M. (2013). Liberia climate change assessment. [http://www.academia.edu/18434866/LIBERIA\\_CLIMATE\\_CHANGE\\_ASSESSMENT](http://www.academia.edu/18434866/LIBERIA_CLIMATE_CHANGE_ASSESSMENT).
- USAID. (2012). Climate change adaptation in Liberia.  
[https://www.climatelinks.org/sites/default/files/asset/document/liberia\\_adaptation\\_fact\\_sheet\\_jan2012.pdf](https://www.climatelinks.org/sites/default/files/asset/document/liberia_adaptation_fact_sheet_jan2012.pdf).

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Afrobarometer is produced collaboratively by social scientists from more than 30 African countries. Coordination is provided by the Center for Democratic Development (CDD) in Ghana, the Institute for Justice and Reconciliation (IJR) in South Africa, the Institute for Development Studies (IDS) at the University of Nairobi in Kenya, and the Institute for Empirical Research in Political Economy (IREEP) in Benin. Michigan State University (MSU) and the University of Cape Town (UCT) provide technical support to the network.

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