

I enjoyed reading the revised manuscript and appreciated the changes made in response to the previous comments. The study now provides more detailed insight into the regions considered, along with an expanded interpretation of Figure 5. Clear effort has gone into strengthening both the introduction and the discussion, and the manuscript now presents a more coherent storyline. I consider this to be a comprehensive study that requires only a few minor corrections to typos and formatting. In my view, it is suitable for publication after minor revisions

We thank the reviewer for the positive and constructive feedback. It's encouraging to hear that the revisions have improved the clarity and coherence of the manuscript, particularly the regional analysis and discussion. We address the remaining minor comments below.

Line 42: Please rephrase "extremes". Destructive wildfires do not occur only under extreme fire weather, and season lengthening is not itself an extreme. Rather, there is a broader shift in overall fire weather conditions.

We have removed the word "Extreme"

Line 51: Typo in "Los Angeles"

Corrected

Lines 118 to 120: There is some redundancy with the beginning of the section.

We have removed the final sentence in this section, "However, fire weather indices applicability is more limited in fuel-constrained systems, where fire occurrence depends more strongly on fuel accumulation than on weather alone (Kelley and Harrison, 2014)", as the main point is covered in the opening statement of the section, just in reverse.

Section 3.2.1, "burnable land with increase ..." This metric is central to the study, but in its current wording it is difficult to grasp. Consider using a simpler and more intuitive term, such as "exposed area" and define it clearly

We have inserted the following line at line 249 - "We henceforth refer to this burnable land as "exposed area" for simplicity." and have changed all further text referring to burnable land to be exposed area

Line 749: Formatting "AND Very"

Corrected

Line 757: "High" should not be italic

Corrected

Line 766: Please remove the long dash after FFDI.

Removed

Lines 859 to 860: Here again, it is difficult to understand what the number actually represents. Does it indicate a 50 % increase in the days, or an increase in days across 50 percent of the area? Similar to the comment on Section 3.2.1, this should be phrased more clearly.

These are from Table 3, which we now reference. And we have rephrased this sentence to read “At 4.0°C, we project an increase in days above the Very High FFDI over 50% of affected exposed area worldwide, compared to 30% at 1.5°C warming (Table 3)”

Line 988: "Recommendations" is somewhat misleading here. Please consider revising this to "Limitations and future perspectives"

That's a nice subheading suggestion. Changed as suggested

Lines 1014 onward: I'm still not a fan of listing some future research questions without discussing them. I would suggest focusing on one or two particularly promising follow-up directions and discussing them in a bit more depth instead.

We have rephrased this section to reflect the suggestions so that it is no longer a list and focuses on 3 main areas for future research with some more discussion around each one. We have deleted the original list and inserted the following text:

“One key area is the identification of thresholds at which fire suppression might become ineffective under increasingly extreme fire weather conditions. Given the projected rise in Very High FFDI and earlier transitions into the fire season, future studies could link fire weather metrics to operational limits, helping to determine when and where suppression capacity may be exceeded. This also requires an objective

assessment of which adaptation strategies could be most effective at reducing the risks from increased fire weather and exceeding suppression capacity.

In addition, building on the analysis of transitions between fire weather periods and the persistence, yet narrowing, of low fire weather windows, future research could work closely with fire managers and practitioners to co-develop dynamic fire management strategies and translate these diagnostics into planning tools. This could include adapting fuel load management strategies to optimise fuel management whilst minimising unintended consequences. This would support more adaptive Integrated Fire Management approaches that respond to shifting seasonal risk profiles under climate change.

Fire weather indices tend not to include representations of ignitions sources and fire models often use simple parametrisations of ignitions sources. An integration of socio-economic factors including population growth, land-use changes, and social behaviour could provide more robust approaches to representations of ignitions in fire modelling and inform opportunities for adaptation and Integrated Fire Management.”

Figure A1: Please switch the axes so that burned area is shown on the y axis.

We have switched as requested.