Dear Maunakea stakeholders and University of Hawai'i community,

We are a growing list of individuals working in STEM (science, technology, engineering, and math) fields within, or associated with, the University of Hawai'i (all campuses) who openly stand in solidarity with the Maunakea protectors. We are UH professors, faculty, staff, administrators, postdoctoral researchers, and graduate and undergraduate students. We acknowledge our responsibility to think critically about the methods and goals of our research. We recognize the need for open-minded discussions as well as analysis of the history and continued legacy of colonial science, the meaning of community-embedded research, and the future of STEM fields. If you are part of the UH STEM community and wish to join us please sign your name to the list (CLICK HERE TO SIGN) and forward this Google document to colleagues.

Statement of Solidarity

We stand in solidarity under the following key points:

- 1. We oppose the misinformation which has labeled the protectors of the mauna as "anti-science" or "anti-astronomy". As STEM professionals, we recognize that this viewpoint is false and that this issue is not a matter of culture vs. science. We recognize that the pushback against the Thirty Meter Telescope (TMT) is about the way the science was being done, not about the astronomy itself. We understand it's about the politics behind the decision-making regarding TMT construction, about the history of mismanagement of the mauna, and about the oppression of Native Hawaiians and the land. We understand that Native Hawaiians have been ecological stewards for hundreds of years, and navigated by the stars, before western science ever landed on the Hawaiian Archipelago. We recognize that "progress" is not such if made at the expense of people and land.
- 2. As STEM professionals who value ethical science, we recognize it is up to Native Hawaiians and the protectors of Maunakea to make decisions about the fate of Maunakea and TMT construction in Hawaii. We validate Hawaiian culture and recognize the legitimate role of Native Hawaiians as protectors of the mauna.
- 3. We believe STEM communities in Hawai'i should incorporate and value Native Hawaiian knowledge and culture during all stages of a project. University of Hawai'i has been designated a "Hawaiian Place of Learning", and should embody this in its research endeavours. We also recognize indigenous knowledge as legitimate scientific knowledge.
- 4. We believe that the ethics of data extraction, exploration, and the uncovering of scientific knowledge should be in union with place and people. In order to better provide scientific knowledge for all people and for the planet, we must re-evaluate and

redefine whom and what the scientific field values (eg. who will benefit and at what cost?).

5. We recognize that the issue of racism towards Native Hawaiians (and indigenous people in other communities) does not begin or end with Maunakea and will require continued effort. We must address the issues that brought Hawaiii to this pivotal point on Maunakea. All systems of thought are deeply tied to the cultures with which created them. In the case of western science: colonialism and white patriarchal systems of hierarchy dominate.

Suggested Action Items

- 1. Sign your name on the list via this form to stand in solidarity.
- 2. When filling out the form, include your email to join the UH Scientists for Maunakea listserve, which was created to foster connections and unity amongst those in STEM fields within or associated with the University of Hawai'i. It allows people to share resources/updates regarding Maunakea and ways of supporting Maunakea protectors.
- 3. Post this <u>social media image</u> on fb, twitter, or instagram and/or hang this <u>flyer</u> in your office or building to encourage others to stand in solidarity.
- 4. Share this statement of solidarity with colleagues via email.
- 5. Donate to efforts supporting Maunakea protectors:
 - www.protectmaunakea.net/donate www.puuhuluhulu.com/donate
- 6. Visit Maunakea to take classes offered through Pu'uhonua o Pu'uhuluhulu University (@puuhuluhulu) or volunteer on the mauna.
- 7. Stay up to date on what's happening on the mauna (and locally in your town) by following:

@kakoo haleakala

@puuhuluhulu

@protectmaunakea

@hawanemusic

Resources and further reading

- 1. "Opponents of the Thirty Meter Telescope fight the process, not science" by Dr. Rosie Alegado
- 2. "Before building another telescope, learn from Hawaiian culture" by Dr. Haunani Kane
- 3. <u>"Maunakea: Redirecting the lens onto the culture of mainstream science" by Aurora</u> Kagawa-Viviani
- 4. <u>"Why Native Hawaiians are fighting to protect Maunakea from a telescope" by Trisha</u> Kehaulani Watson-Sproat
- <u>"The Fortress, the River and the Garden: A New Metaphor for Cultivating Mutualistic</u> <u>Relationship Between Scientific and Traditional Ecological Knowledge" by Robin Wall</u> <u>Kimmerer</u>

This document was created by graduate students and edited by faculty and researchers at the University of Hawai'i at Mānoa in the School of Ocean, Earth, Science, and Technology (SOEST). We recognize that many wanted to partake in the formation of this document, but were already over-committed to other Maunakea initiatives. Native Hawaiian students and faculty often end up working additional community and diversity projects that can be a heavy load on top of everyday work. This document is an attempt to create a unified voice of support from the University of Hawai'i STEM community in particular, as this issue pertains to our professional field in question, and our institution is a direct stakeholder in TMT construction. However, we also want to acknowledge the many initiatives of individuals in UH departments outside of STEM fields.

Free Speech: No Repercussions for Signing

The Dean of SOEST, Brian Taylor, publicly released an email statement that "The [SOEST] Dean's office fully encourages an open and respectful dialog on these issues. No one should feel vulnerable for airing their views and there will be no negative consequences for an honest and considerate discussion." Other departments should follow the same protocol of free speech. We understand that some may feel pressured to withhold from signing, however we hope you choose to have courage to stand in solidarity. If you consider yourself a part of the STEM community at the University of Hawai'i (all campuses), we invite you to join in signing.

Signed,

Members of the University of Hawai'i STEM community: professors, faculty, staff, administrators, postdoctoral researchers, associated researchers, and graduate and undergraduate students in scientific disciplines (CLICK HERE TO SIGN)

- 1. Kirstin Thompson (Oceanography graduate student, SOEST, UH Mānoa)
- 2. Lucie Knor (Oceanography graduate student, SOEST, UH Mānoa)
- 3. Anamica Bedi de Silva (Oceanography graduate student, SOEST, UH Mānoa)
- 4. Camilla Tognacchini (Oceanography graduate student, SOEST, UH Mānoa)
- 5. Ashley Hi'ilani Sanchez (Oceanography graduate student, SOEST, UH Mānoa)
- 6. Andrian Gajigan (Oceanography graduate student, SOEST, UH Mānoa)
- 7. Emily Young (Oceanography graduate student, SOEST, UH Mānoa)
- 8. Gabrielle Stedman (Oceanography graduate student, SOEST, UH Mānoa)
- 9. Katy Hintzen (Extensions Faculty, SOEST, UH Mānoa)
- 10. Diamond Tachera (Earth Sciences graduate student, SOEST, UH Mānoa)
- 11. Jonathan Fisk (Natural Resources and Environmental Management graduate student, UH Mānoa)
- 12. Frederick Reppun (Junior Specialist, Hawai'i Institute of Marine Biology, UH Mānoa)
- 13. Kammie Tavares (Earth Sciences graduate student, SOEST, UH Mānoa)
- 14. Shannon McClish (Oceanography graduate student, SOEST, UH Mānoa)

- 15. Narrissa Spies (Biology graduate student, UH Mānoa)
- 16. Kate Feloy (Oceanography graduate student, SOEST, UH Mānoa)
- 17. Sarah Tucker (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 18. Jane Chung-Do (Associate Professor, Public Health, UH Mānoa)
- 19. Eileen Nalley (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 20. Tom Iwanicki (Zoology graduate student, UH Mānoa)
- 21. Ku'i Keliipuleole (Biological Oceanography student, SOEST, UH Mānoa)
- 22. Jack Runburg (Physics & Astronomy graduate student, UH Mānoa)
- 23. Aurora Kagawa-Viviani (Geography and Environment graduate student, UH Mānoa)
- 24. Jordan Gossett (Zoology graduate student, UH Mānoa)
- 25. Melissa Atkins (Zoology graduate student, UH Mānoa)
- 26. Evy Braum (Faculty, CTAHR, UH Mānoa)
- 27. Vasco Mueller (Oceanography Postdoc, IPRC/SOEST)
- 28. Samantha Keaulana-Scott (Public Health graduate student, UH Mānoa)
- 29. Maria Daniella Douglas (Intern, HIGP, UH Mānoa)
- 30. Smrity Ramavarapu (Botany graduate student, UH Mānoa)
- 31. Taro Schmeeckle (Chemistry graduate student, UH Mānoa)
- 32. Christian Dye (Native Hawaiians Health, graduate student John A. Burns School of Medicine, UH Mānoa)
- 33. Aloha Kapono (Affiliated researcher, Aloha 'Āina, UH Hilo)
- 34. Roxie Sylva (Marine Science alumni, UH Hilo)
- 35. Korey Wong (Undergraduate Lab Assistant, Pre-Law, Environmental Science, SOEST, UH Mānoa)
- 36. Patrick Nichols (Zoology graduate student, UH Mānoa)
- 37. Piper H (Temporary Assistant Professor, Mathematics, UH Mānoa)
- 38. Devin Murray (Temporary Assistant Professor, Mathematics, UH Mānoa)
- 39. Kristian McDonald (Earth Sciences graduate student, SOEST, UH Mānoa)
- 40. Angeles Gallego (Oceanography graduate student, SOEST, UH Mānoa)
- 41. Cassie Ka'apu-Lyons (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 42. Leon Tran (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 43. Anuschka Faucci (staff, Math & Sciences Division, Marine Biology/Ecology, Leeward Community College)
- 44. Jessica Lee (Marine Science student, Leeward Community College)
- 45. Amber Caracol Noguchi (previous Academic Advisor in the College of Natural Sciences, UH Mānoa, also Co-Chair of the Hawaii Advisory Group for the 2019 SACNAS National Diversity in STEM Conference)
- 46. Kara Nichols (Undergraduate student, SOEST, Leeward Community College)
- 47. Maya Walton (Junior Specialist, SOEST, UH Mānoa)
- 48. Sabrina Diemert (Civil and Environmental Engineering graduate student, UH Mānoa)

- 49. Kainalu Steward (Hawaiian Studies undergraduate, UH Hilo)
- 50. McLean Worsham (Biology graduate student, UH Mānoa)
- 51. Kameryn Williams (Temporary assistant professor, Mathematics, UH Mānoa)
- 52. Rosie Alegado (Associate Professor, Oceanography & Sea Grant, UH Mānoa)
- 53. Mapuana Antonio (Faculty, Public Health, UH Mānoa)
- 54. Emily Conklin (Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 55. Trista McKenzie (Earth Sciences graduate student, UH Mānoa)
- 56. Paolo Marra-Biggs (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 57. Jessie Perelman (Oceanography graduate student, SOEST, UH Mānoa)
- 58. Melanie Leila Dudley (Tropical Conservation Biology and Environmental Science graduate student, UH Hilo)
- 59. Jeff Schueler (Physics and Astronomy graduate student, UH Mānoa)
- 60. Manuel Diaz (Plant Biology and Tropical Agriculture Undergraduate, staff, and researcher, Leeward Community College)
- 61. Alison Nugent (Faculty, Atmospheric Sciences, SOEST, UH Mānoa)
- 62. Yvonne Chan (Alumnus Postdoctoral Researcher and Instructor, Biology, UH Mānoa)
- 63. Kanoelani Steward (Hawaiian Language and Literature graduate student, Marine Science Alumni, Keaholoa STEM graduate, UH Hilo)
- 64. Elizabeth Miller (Oceanography graduate student, SOEST, UH Mānoa)
- 65. Kanesa Duncan Seraphin (Professor, Hawai'i Sea Grant, SOEST, UH Mānoa)
- 66. Casey Lynn Brinkman (Astronomy graduate student, UH Mānoa)
- 67. Lauryn Hansen (Oceanography graduate student, SOEST, UH Mānoa)
- 68. Linnea I. Heu (Program Coordinator, PIPES (STEM undergraduate internships), Tropical Conservation Biology and Environmental Science (TCBES) graduate, UH Hilo)
- 69. Mika Siegelman (Oceanography graduate student, SOEST, UH Mānoa)
- 70. Brett Walker (Earth Sciences graduate student, SOEST, UH Mānoa)
- 71. Van Wishingrad (Biology-population genetics graduate student, UH Mānoa)
- 72. Katherine Burke (Public Health graduate student, nursing staff, UH Mānoa)
- 73. Waynele Yu (Learning Design and Technology graduate student & Institute for Teacher Education faculty, UH Mānoa)
- 74. Shreya Yadav (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 75. Ian Cunnyngham (Astronomy graduate student, UH Mānoa)
- 76. Sabena Siddiqui (Tropical Conservation Biology and Environmental Sciences, graduate student, UH Hilo)
- 77. Ronald Paul Kittle III (Tropical Conservation Biology & Environmental Science, Marine Science Alumnus, UH Hilo)
- 78. Anna Mikkelsen (Earth Sciences graduate student, SOEST, UH Mānoa)
- 79. Nikola Rodriguez (Tropical Conservation Biology & Environmental Science, graduate student, UH Hilo)
- 80. Mykle Hoban (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)

- 81. Marina Karides (Chair and Professor, Sociology, UH Hilo)
- 82. Sharon Ziegler-Chong (Staff, Research & Community Partnerships, PIPES/HCSU/PI-CASC, UH Hilo)
- 83. Carolyn Flacker (College of Tropical Agriculture & Human Resources, Student, UH Mānoa)
- 84. Michelle Manes (Professor, Mathematics, UH Mānoa)
- 85. Rebecca Webster (Tropical Conservation Biology and Environmental Science, graduate student, UH Hilo)
- 86. Jessica Schaefer (Biology graduate student, UH Mānoa)
- 87. Petra Byl (Oceanography graduate student, SOEST, UH Mānoa)
- 88. Ellis Avallone (Astronomy graduate student, UH Mānoa)
- 89. Tasha Kawamata Ryan (Staff, Student Equity, Excellence and Diversity (SEED)/ METS program, UH Mānoa)
- 90. Rosalyn Concepcion (Cultural fishpond practitioner, Hawaiian studies, aquaculture, UH Mānoa, kia'i at Waikalua Loko i'a)
- 91. Claire Atkins (Marine Biology student, UH Mānoa)
- 92. Celeste Collins (Biology undergraduate student, UH Mānoa)
- 93. Blaze Keolamakamae Rivera (Civil Engineering Undergraduate student, UH Mānoa)
- 94. Benjamin Gochenouer (Earth Science undergraduate student, UH Mānoa)
- 95. Danyel Yogi (Microbiology Undergraduate Research Assistant, UH Mānoa)
- 96. Elizabeth Conlon (Botany graduate student, UH Mānoa)
- 97. Derek Kraft (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 98. Claire Lewis (Zoology graduate student, UH Mānoa)
- 99. Dionne Sesepasara (Animal science undergraduate student, UH Mānoa)
- 100. RickiLee Yeboah (Public Health graduate student, UH Mānoa)
- 101. Shimi Rii (faculty, He'eia National Estuarine Research Reserve, Hawai'i Institute of Marine Biology, UH Mānoa)
- 102. Jaelyn Takiguchi (Public Health graduate student, UH Mānoa)
- Michaela Johnson (Global Environmental Studies undergraduate student, UH Mānoa)
- Moana Nomura (Civil and Environmental Engineering undergraduate student, UH Mānoa)
- 105. Katey Peck (Public Health graduate student, UH Mānoa)
- 106. Jeannie Ho (Public Health graduate student, UH Mānoa)
- 107. Tehani Malterre (Global Environmental Studies undergraduate student, UH Mānoa)
- 108. Mehana Blaich Vaughan (Associate Professor, Department of Natural Resources & Environmental Management, UH Sea Grant College Program, UH Mānoa)
- 109. Cameron Ogden-Fung (Natural Resources and Environmental Management, graduate student, UH Mānoa)
- 110. Jesse Black (Oceanography graduate student, SOEST, UH Mānoa)
- 111. Brittney Bonilla (Kinesiology & Rehabilitation Science, Administrative Assistant, Alumni, UH Mānoa)

- 112. Solomon Champion (Botany graduate student, UH Mānoa)
- 113. Rachel Dacks (Post-doctoral research fellow, Botany, UH Mānoa)
- Nicole Chatterson (Sustainability Living Lab Coordinator, Staff, Office of Sustainability, UH Mānoa)
- 115. Christina Kaleiwahea (Information technology management student, UH Mānoa)
- 116. Kauanoeanuhea Zabala-Moore (Natural Science student, Kapi'olani Community College)
- 117. Kirsten Poff (Marine Biology graduate student, UH Mānoa)
- 118. Kaylee Rossing (Hawai'i Institute of Marine Biology, staff, UH Mānoa)
- 119. Nakoa Goo (Marine Biology graduate assistant, Hawai'i Institute of Marine Biology, UH Mānoa)
- 120. Creighton M. Litton (Professor Natural Resources and Environmental Management, UH Mānoa)
- 121. Mariana Rocha de Souza (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 122. Aimee Sato (Botany graduate student, UH Mānoa)
- 123. Emily Sesno (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 124. Erika Alvarado (Botany/Marine Biology graduate student, UH Mānoa)
- 125. Ariana Huffmyer (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 126. Hoaka Thomas (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 127. Sitara Palecanda (Marine Biology graduate student, Hawai'i Institute of Marine Biology, UH Mānoa)
- 128. Kelsey Nichols (Oceanography undergraduate student, UH Mānoa)
- 129. Penny-Bee Kapilialoha Bovard (Junior Specialist Faculty, graduate student, Women's & Hawaiian Studies, Student Athlete Academic Services Advisor, UH Mānoa)
- Joanna Philippoff (Assistant Specialist, Curriculum Research & Development Group, College of Education, UH Mānoa)
- 131. Zoe Hastings (Botany graduate student, UH Mānoa)
- 132. Bryson Kalani McFeeley (IT Specialist, Mānoa Institutional Research, UH Mānoa)
- 133. Kristy Lam (Natural Resources and Environmental Management, graduate student, UH Mānoa)
- 134. Andrés E. Salazar E. (Oceanography graduate student, SOEST, UH Mānoa)
- 135. Noweo Kai (buildings and grounds management campus arboretum, staff curator, UH Mānoa)
- 136. Zion Tamashiro (Mechanical Engineering, Pre-Engineering, student, UH Mānoa)
- 137. Shayle Matsuda (Marine Biology, graduate student, UH Mānoa)
- 138. Donna Lee (Sweetie) Kuehu (Molecular Biosciences & Bioengineering, Graduate Student, UH Mānoa)
- 139. Jennifer Engels (Affiliate faculty, Hawai'i Institute of Geophysics and Planetology, UH Mānoa)

- 140. Hi'ilei Casco (Natural Resources and Environmental Management, graduate student, UH Mānoa)
- 141. Sean Mahaffey (Oceanography graduate student, SOEST, UH Mānoa)
- 142. Elise Dela Cruz-Talbert (epidemiology graduate student and lecturer, UH Mānoa)
- 143. Siena Schaar (Natural Resources and Environmental Management, graduate student, UH Mānoa)
- 144. Becca Lensing (Marine Biology, graduate student, UH Mānoa)
- 145. Kanoe'ulalani Morishige (Biology, graduate student, UH Mānoa)
- 146. Samantha Alvarado (Natural Resources and Environmental Management, graduate student, UH Mānoa)
- 147. Cliff Kapono (Marine Science, Postdoc, UH Hilo)
- 148. Ashley McGuigan (Botany graduate student, UH Mānoa)
- 149. Tamara Ticktin (Botany professor, UH Mānoa)
- 150. Julia K. Douglas (Botany graduate student, UH Mānoa)
- 151. Ashley "Nalani" Olguin (Marine Biology, graduate student, UH Mānoa)
- 152. Alana Wilson (Native Hawaiian and Indigenous Health (MPH), graduate student, UH Mānoa)
- 153. Lauren Nerfa (Botany graduate student, UH Mānoa)
- 154. Noelani Puniwai (Assistant Professor, Kamakakūokalani Center for Hawaiian Studies, UH Mānoa)
- 155. Frankki Ramirez (Global Environmental Science, Undergraduate Student, UH Mānoa)
- 156. Winona Kaalouahi Lee (Associate Professor, Native Hawaiian Health, JABSOM, UH Mānoa)
- 157. Sherril Leon Soon (Hawai'i Institute of Marine Biology, postdoc, UH Mānoa)
- 158. Nicole Kahielani Peltzer (Public Health, Graduate student/RCUH staff, UH Mānoa)
- 159. Sarah Kamakawiwo'ole (Public Health, Graduate Student, UH Mānoa)
- 160. Isaiah Zafra-Bungay (Natural sciences, Undergrad student, UH Mānoa)
- 161. Victoria Pun (Public Health, graduate student, UH Mānoa)
- 162. Ryan Ueunten (Natural Resources and Environmental Management, Graduate Student, UH Mānoa)
- 163. Eldridge Shay (Mechanical Engineering, Graduate Student, UH Mānoa)
- 164. Elizabeth Rank (Atmospheric Science, student, UH Mānoa)
- Moana Nomura (Civil and environmental engineering, undergrad student, UH Mānoa)
- 166. (CLICK HERE TO SIGN)