



**Ambient Heat Exposure**  
**Virtual Stakeholder Meeting Summary**  
Ma4 5, 2022 1:00 p.m. via Zoom

**Washington State Department of Labor & Industries (L&I) Staff present:**

Carmyn Shute, DOSH Administrative Regulations Analyst/Project Manager  
David Gaw, DOSH Management Analyst  
Chris Miller, DOSH Standards Program Manager  
Bradley Farrar, DOSH Statewide Agricultural Safety Specialist  
Teri Neely, DOSH Technical Services Safety Program Manager  
Laura Rascon Padilla, DOSH Industrial Hygienist/Spanish Interpreter  
Allison Drake, DOSH Policy/Stakeholder Engagement Manager  
Dr. Dave Bonauto, L&I SHARP Research Director  
Dr. June Spector, L&I SHARP Heat Stress Researcher  
Cari Anderson, Deputy Assistant Director  
Tracy West, Agency Rules Coordinator/Senior Policy Advisor  
Maggie Leland, Government Affairs and Policy Division Executive Policy Manager  
Carissa Painter, Administrative Assistant

**Attendees:**

290 Pre-registered attendees with an average of 205 attendees present.

**Summary:**

Meeting called to order at 1:04 p.m.

DOSH staff provided introductions for presenting panelists, general virtual meeting procedures and etiquette, a short review of the last stakeholder meeting in March, and a presentation pertaining to the specific details of the upcoming ambient heat stress emergency rule.

It was shared that L&I is looking to complete Emergency Rulemaking effective this summer, as the significant safety and health concern necessitates greater protections, and we have been petitioned to do so. Through this process, we are gathering information that will apply to both an Emergency Rule this summer as well as a permanent rule. A CR-101 (Preproposal) was filed in August 2021 to initiate the rulemaking process. L&I staff stated a number of times that we want to hear from stakeholders regarding how the heat stress rules affected work processes, and suggestions/comments in order to assist in creating an effective, yet least burdensome standard for employers.

Presentation materials were posted to the Ambient Heat Exposure rulemaking webpage earlier today.

**Presentation: [Bradley Farrar and Laura Rascon Padilla presented information related](#)**

to the temporary Emergency Rule that is tentatively scheduled for filing on June 1, 2022.

**Question and answer session:**

***Yesterday OSHA had its 9-3pm PT session on “Protecting Workers from Health”. How will rule-making at the federal and WA state levels impact each other?***

**DOSH Response:** Our agencies work very well and close together. L&I will publish our rule prior to OSHA, and OSHA will look at what we do and what other states and agencies do and if we need to incorporate something sooner, we will do that.

***Will these PowerPoint slides be available at the end of the presentation?***

**DOSH Response:** The PowerPoint presentation is available in English at this time at <https://lni.wa.gov/safety-health/safety-rules/rulemaking-stakeholder-information/ambient-heat-exposure-rulemaking>.

***Same question as Lisa :) Also I really like the trigger temperatures based on clothing.***

**DOSH Response:** The PowerPoint presentation is available in English at this time at <https://lni.wa.gov/safety-health/safety-rules/rulemaking-stakeholder-information/ambient-heat-exposure-rulemaking>. Thank you for your comment as well.

***What are the systems around enforcing these rules?***

**DOSH Response:** At the moment, this emergency rule isn't very different from our other rules so our enforcement practices would be the same as any other rule.

***Can you give an example of what suitably cool means?***

**DOSH Response:** We do have a note in agriculture chapter that states suitably cool is 60 degree or less and for this rule we don't have an exact temperature there. Want water to be at temperature that promotes it being drunk and if it's too hot, people are hesitant to drink water and that effects their hydration.

***How are workers who are paid via what they pick rather than per hour still paid during cool-down periods?***

**DOSH Response:** We are going to gather thoughts and make sure that goes out in written format. Agriculture employees must be separately compensated.

***Can you put the definition of shade in the chat?***

**DOSH Response:** Shade. A blockage of direct sunlight. One indicator that blockage is sufficient is when objects do not cast a shadow in the area of blocked sunlight. Shade is not adequate when heat in the area of shade defeats the purpose of shade, which is to allow the body to cool. For example, a car sitting in the sun does not provide acceptable shade to a person inside it, unless the car is running with air conditioning. Shade may be provided by any natural or artificial means that does not expose employees to unsafe or unhealthy conditions and that does not deter or discourage access or use.

***Is this a heat related rest period?***

**DOSH Response:** Yes. (Note: There was a glitch with Zoom and it kicked out most of the panelists. We needed to re-enter the meeting.)

***Can you tell me what tab (sorry I'm new to this position) I've have clicked 5 different ones with no luck?***

**DOSH Response:** You can find the presentation at <https://lni.wa.gov/safety-health/safety-rules/rulemaking-stakeholder-information/ambient-heat-exposure-rulemaking> and click on the "Meetings" tab.

***Would the following be examples of location discouraging use? —within crop rows that forbids eating per food safety handling rules. —cultivated wine grape vines, requiring workers to be on the ground, have snakes and insects also taking refuge in shade —hops rows with very high ambient humidity and stifled crossbreeze flow?***

**DOSH Response:** Of course we would look at everything on case by case basis but some of the examples you listed could definitely discourage use.

***Would you anticipate acclimatization to be lost after a 3 day weekend? Our company works a 4/10 workweek.***

**DOSH Response:** Not necessarily but again there is case by case basis where different employees might need different acclimatization.

***What is the method for calculating paid preventative rest breaks for workers being paid via piece rate?***

**DOSH Response:** See L&I Employment Standards Administrative Policy ES.C.6.2 at [https://lni.wa.gov/workers-rights/\\_docs/esc6.2.pdf](https://lni.wa.gov/workers-rights/_docs/esc6.2.pdf).

***Is this summary table available somewhere?***

**DOSH Response:** Yes, we have posted it in chat.

***Will the definition of suitably cool include further clarification, maybe temperature ranges?***

**DOSH Response:** Again, we talked about what suitably cool is and yes, we do have further clarification on what the expected temperature range is and will provide more guidance on that.

***Can you speak to how employers will be informed about the rule and how it will be enforced? What are consequences for non-compliance?***

**DOSH Response:** The stakeholder meeting is an example and through the website link that we provided earlier, there are links in chat. Also in this presentation, which are posted on LNI Website. There wouldn't be differences on this emergency rule, compared to other rules. It will be our usual practices.

***What is the definition of suitably cool water?***

**DOSH Response:** See response above.

***How is “Suitably cool” defined?***

**DOSH Response:** See response above.

***Is the suitable cool definition the same as the DOH definition?***

**DOSH Response:** Not sure if it's the same definition as Department of Health, but we will look into that.

***As I pointed out at the previous meeting, it will be very difficult if not impossible to provide areas of shade on steep hillsides and other hard to access areas of logging operations. Misting stations or cooling vests would not be a feasible option either.***

**DOSH Response:** Appreciate the comments, we will take and use this to work on the rule. Comments will be given to the specialists and we can look into that. Thank you for comment.

***It was mentioned that shaded areas must accommodate EEs so they can sit in a normal position. Do chairs need to be provided or can they sit on the ground?***

**DOSH Response:** Definition of shade says it must be adequate to provide shade for all employees on rest periods where they're able to sit in a normal position. There is no requirement to provide chairs.

***What rules are there about vehicles used for outdoor work (they sit outdoors in the sun) to have air conditioning?***

**DOSH Response:** There aren't any rules that specify vehicles need to have A/C but if it doesn't, you're going to want to ensure you're taking measures to prevent Heat Related Illnesses (HRI).

***When will the updated Outdoor Heat Exposure training and associated kit be available?***

**DOSH Response:** Our Education and Outreach team is working on updating all of our training materials and will hopefully get that out soon.

***How would you define effective communication? And does this need to be documented?***

**DOSH Response:** We do have in the draft, the definition of effective communication and this can be by voice, radio, and phone, as long as there is ongoing communication and employer and employees can be notified as needed. It is important that employees have procedures and have an APP and how that will occur.

***Will the LNI online video be updated to reflect the new ruling by June 1<sup>st</sup> 2022?***

**DOSH Response:** Not sure about the answer on that but we will take note and find out.

***Does close observation of new employees need to be documented related to acclimatization?***

**DOSH Response:** It would be making sure there are procedures for how there will be close observations for employees for acclimatization.

***You mentioned employees can use their own vehicles for shade with AC...***

**DOSH Response:** In definition of shade we mentioned a vehicle is adequate shade if A/C is running. Didn't specify whose vehicle is being used, just gave examples that a vehicle running with A/C would be a requirement for shade but vehicle without A/C would not.

***Does the Department have data that shows that the current heat stress rules are ineffective and necessitate either the "emergency" rule or a new permanent rule? Also, how does the Department justify an emergency rule (besides avoiding the statutory permanent rulemaking process) when summertime heat happens every year?***

**DOSH Response:** That data has been published and was shared at a prior stakeholder meeting. We recognize there is indeed a hazard that happens every year and wanted permanent rulemaking and didn't get that far and needed an emergency rule so we have protections in place for employees and that is why we are doing an emergency rule again this year.

***I have 75-80 drivers in 75-80 separate trucks working in different temperature regimes every day, AND each is moving between temperature zones repeatedly during their shifts. Some zones have no cell service and/or spotty 2-way radio coverage. How often would I be required to contact each acclimatizing driver or regular driver to verify their condition is good visavis the rule? It sounds like I could be spending most of every warm day neglecting all other aspects of my job in order to meet this standard.***

**DOSH Response:** We are leaving flexibility both in the effective means of communication and the regular communication that you may have. We understand that different situations means different communication and we have flexibility for employers to figure out what might work. Frequency – is important to make sure there is communication available when needed at a moment's notice and so frequency depends based on employees and degree of acclimatization and other risk factors. If they are driving in an air conditioned vehicle, that would be great and in general, we do have exceptions for incidental exposure in our rule and that is being used in emergency rule.

***For the communication requirement between employees and supervisors would any staff member of a higher "rank" be acceptable for example: a safety manager vs my specific crew boss?***

**DOSH Response:** There's nothing specified whether safety manager or specific crew boss would be an acceptable individual, but make sure you have procedures in written APP and inform employees of those procedures and who they'll be in communication with.

***For truck drivers that are exposed to high heat during their duty day (e.g., loading or unloading), can the mandatory 10 rest break be taken while operating an air-conditioned vehicle (i.e., driving to the next job site/location) or will drivers be required to sit in their vehicle, idling with the air conditioning running for 10 minutes?***

**DOSH Response:** We will have to look at that type of scenario more closely.

***part 2..... What if an employee wants to use their own car for shade but not use their AC? Can they just roll down their own windows if they don't want to use the shade provided?***

**DOSH Response:** The one thing that comes to mind and thinking about the amount of heat radiated from a car and without A/C, would most likely not meet requirements of shade. I would recommend that people take breaks in shade that is being produced to cool down and suggest taking breaks in more adequate shade.

***Can you define "cool-down" of the mandatory cool-down rest periods please? Similar to the preventive cool-down?***

**DOSH Response:** The cool down portion is similar to preventative. Difference is temperatures of 89 degrees F or higher, those cool down periods are mandatory. One is on demand and the other is mandatory.

***Was there any appreciable increase in recent reported HRIs compared to decades past? or is this rulemaking merely based on lots of vociferous, recent petitions as explained at the beginning of this presentation? In other words: how much of this is scientifically driven vs. public pressure?***

**DOSH Response:** We just presented in previous stakeholder meeting and presented specific claims data to WA and the importance of heat rulemaking activity and refer you to previous stakeholder meeting slides and presentation that are provided.

***For remote/mobile employees that are in multiple locations and temperatures throughout their duty day, how should employers monitor threshold/exposure temperatures?***

**DOSH Response:** We do understand that employers may have employees that are in multiple locations and temperatures may vary. We do require that employers monitor temperature at working location. That is one reason we have chosen actual temperature, is for simplicity.

***Will the emergency rule establish a shut down temperature for outdoor work? Like sudden spike temperatures 100 degrees or over in the outdoor Construction trades?***

**DOSH Response:** This emergency rule does not establish shutdown temperature for outdoor work.

***Has the science that Oregon examined and used for their rule been reviewed and considered by L&I?***

**DOSH Response:** Yes, we are working with Oregon and California and seeing what they have. Yes, it has been.

***Where can we find training resources on this subject?***

**DOSH Response:** It will be through Education and Outreach and will publish FAQs when information goes out and ask if any of that information gets attached to ambient heat page. Yes, we do attach that and will post as soon as available.

***Where can we find info on enforcement of rules/ associated fines, frequency of inspections, depth of inspections, etc.?***

**DOSH Response:** We do have much information available, similar to DOSH directives for responsibility on general contractors, we do have other DOSH directives for enforcement available on LNI website. Also, just in general, DOSH compliance manual is also publically available on website and explains policies around fines, frequency and depth of inspections. Some may need public disclosure request.

***Can employees bring their own coolers, water bottles, gatorade, etc?***

**DOSH Response:** Yes, employees can bring their own liquids, but employer is required to provide water as well. Can't rely on employees bringing their own.

***Where should we find the weather forecast for a specific area? Can we use a simple thermometer to determine the temperature?***

**DOSH Response:** Multiple ways of gathering the temperature, but we really want to measure temperature at worksite. Simple thermometer can be great method to measure temperature at workplace.

***If we hire an employee from another contractor who was already used to the heat would we have to acclimatize them?***

**DOSH Response:** That is important point to consider moving forward with acclimatization. At the moment, if an employer has new employee for them that is being assigned to work at trigger temperature, then acclimatization would be important.

***If we have to watch employees during acclimatization and acclimatization is on a case by case basis - how do we know who needs to be watched?***

**DOSH Response:** The defined trigger temps is something to be thinking of for acclimatization and requirements for that and the different risk factors for employees is good way to determine acclimatization for different employees. Acclimatization is individual and is why it's important to keep an eye on new employees or returning employees during the first 14 days of work.

***Will L&I create any online training resources that will be in line with the emergency rule? APP addendum template?***

**DOSH Response:** Similar to last year, LNI did create alot of online training resources that dealt with emergency rule and the final slide will provide link to be heat stress page and is a wonderful place to find training recourses and other information about heat related illness and outdoor heat exposure.

***How will L&I rule-making and enforcement on smoke and heat be coordinated to effectively protect workers' health?***

**DOSH Response:** We are trying to release both emergency rules on same timeline to make them both easier to train on and implement.

***If you are a general contractor for residential construction and provide water and you have sub-contractors, if you do a walk around and as far as heat related injuries, are we responsible for anything as well? Do we have to provide water and monitor every sub-contractor on site? We don't have schedule control. But as far as time frame, training, etc. are we only responsible for our own employees?***

**DOSH Response:** We do have certain processes for handling host employers and for your specific scenario, please contact us with more details for your specific scenario. There are procedures posted in chat regarding this topic.

***If an employee started before the trigger temps would they be considered acclimatized once it gets to those temps?***

**DOSH Response:** Let's shelve it for a little bit and will get back to you or will be answered in Q&A after the program.

***When will these meetings be in person? Are state employees still working from home?***

**DOSH Response:** We hope to get back in person, some employees may be working from home and some are in the office. It is a mix. Hopefully soon but can't give a specific date.

***Will there be a temperature extreme where work cannot happen? I'm thinking of the extreme heat wave last summer?***

**DOSH Response:** In our rule there isn't a specific temperature that states all work needs to stop. But for this rule, our rule is the bare minimum, employers should monitor temperature and if you see that a heat wave is coming, maybe change time of work and take some administrative controls and think of work-arounds to be able to help prevent heat related illnesses.

***How does L&I identify what is credible science? Are nationally recognized groups like the OCOEM (Amer. College on Occupational & Env Medicine) and ACGIH (Amer. Conference of Govt Industrial Hygienists) consulted over the course of the rule-making?***

**DOSH Response:** We look at peer reviewed research and literature out there and consider agencies such as NIOSH, ACGIH, etc.

***How should close of observations of acclimatization occur with remote/mobile employees (i.e., truck drivers) operating in multiple locations?***

**DOSH Response:** We do have the option for employers to have flexibility to have regular communication by radio or phone because we do recognize there might be some workers going off alone, so there are those options for close observations.

***This is not a question, but regarding communication, there's a cool cost-effective communication tool called Zoleo that's available that is great in remote areas! :-)***

**DOSH Response:** Thank you for your comment.

***Is there a time requirement for the preventative cool down period?***

**DOSH Response:** There isn't, so for those preventive cool down rest periods, isn't a time requirement for those and any employee exhibiting heat related illness signs shouldn't return to work until those signs have subsided and should keep close observation so ensure whether they need medical attention and make sure they're not returning to work sooner than they need to.



***Close observation? And that's for 14 day acclimation period correct? What's the definition of close observation? We do have definition and can be implemented in many ways – regular communication by phone or radio, mandatory buddy system or other effective means.***

***Due to the fact that we generally train several hundred or thousands of people before May 1st and is completed before May 1? Is there any possible way there will be supplemental sheet with additional to training we've already done? Is that feasible and will that be considered training for this emergency?***

**DOSH Response:** Yes, so close observation is required for first 14 days of work.

Yes, if you've already done annual training for the year, training would just be required on the additional requirements for emergency rule and wouldn't need to do training all over again. We will check with education & outreach to see if they're developing something like that, and if they aren't, we can see if they can develop something like that.

***Is acclimatization based on working days or calendar days?***

**DOSH Response:** Right now, we do have it as the first 14 days of work.

***Does the water provided to the employees need to be a certain temperature?***

**DOSH Response:** Yes, we've answered similar questions. And the water needs to be suitably cool, we don't have an exact definition of temperature, but it needs to be at a temperature that promotes and allows employees to want to drink water.

***For acclimatization you stated it started in 4 to 14 days but unless the NIOSH heat document has changed, this only applies to employees under 40 that are "fit". The rest of the work population takes up to 2 times as long. Having to comply with this schedule makes no sense and more importantly, does NOT benefit the majority of the workforce when our temperatures can and do often drop significantly about the time the few who can acclimate start to benefit, at least on the west side of the Cascades. Please differentiate or recognize this in the language and add "where this can be achieved by working in elevated temperatures for at least 5 days". Otherwise, this is a poster child for arbitrary and capricious.***

**DOSH Response:** This is a statement and not a question. We will take this into consideration. Thank you for comment.

***As a PS, OROSHA's draft clearly states the acclimatization period takes 7 to 14 days, please align with this and NIOSH! and they include the caveat noted previously that it's ONLY for fit and under 40.***

**DOSH Response:** Will add to prior comment. Thank you very much.

***Do trigger temps vary based on indoor/outdoor work?***

**DOSH Response:** Right now only working on the outdoor rule.

***Purpose of DOSH directive 27.00 or any other directives are made for CSHOs and consultants to assist them during their inspections. DD 27.00 does not address the heat stress rule in particular either.***

**DOSH Response:** Thank you. I suggest you follow up with Laura Rascon Padilla for more discussion.

***Hate to beat a dead horse but even existing employees with compromised circulatory, cardio and related illnesses are at increased risk and I believe most if not all of this is protected information they may not want to share. Again, how do you balance the right to privacy vs. complying with this new aspect.***

**DOSH Response:** That is really good question and for now training requirements do mention the importance of acclimatization and employee degree of acclimatization and important risk factors that can lead to heat related illness. That's what we have to balance and will take into consideration.

***Are you ignoring anonymous questions? Saving them for the Q&A?***

**DOSH Response:** We are talking questions in the order received. If you'd like to make a comment or ask a question verbally please feel free to raise your hand and we'll make sure to get to you.

***Question on water rulemaking. So employer is required to provide water like in a water cooler and not like water bottles, is that right?***

**DOSH Response:** Yes, the employer is required to provide potable water that can be provided in water coolers or water bottles, there are a variety of means to provide water. Just needs to be potable and suitably cool.

***DD 27.00 page 5 lists the hazards that ERs could be cited for, so does this mean GC are not responsible for Heat Related issues?***

**DOSH Response:** Thank you for this question; it's important. I suggest you follow up with Laura Rascon Padilla for more in-depth discussion on this topic, we will be able to get you better information in another format.

***Clarification needed, acclimatization is first 14 days of work after we reach 100 degrees?***

**DOSH Response:** First 14 days of work after being assigned at one of the trigger temperatures.

***Following the previous question...if I read the draft correctly, there's no longer any change at 100 degrees, the enhanced protections all apply at 89...correct?***

**DOSH Response:** Yes, that is correct.

***Last question someone asked about 100 degree but it was answered that 89 degrees is the trigger temperature for the new rule and acclimatization was triggered at 52,77 & 89. These were not here last year?***

**DOSH Response:** It is triggered at different temperatures, depending on work clothing. The three trigger temperatures have been in the rule and haven't changed. Observations of acclimatization is new.

***We have janitors that work mostly inside, but they have to go outside to check/patrol the buildings, does this apply to us? Or how long does the employee have to outside?***

**DOSH Response:** We do have exemptions for incidental exposure to heat and doesn't apply to incidental exposure and doesn't apply to anyone who is outside less than 15 min/60 min period.

***So you said acclimatization has to take place for 14 days of any of the trigger temps depending on the clothing. So if employees acclimate a 77 degrees and then it gets to 89 with less clothing acclimatization could be another 14 days?***

**DOSH Response:** There is a jump of temperature that is significant and that is something that would be important to consider for acclimatization and we would appreciate any feedback with how the requirements for acclimatization is working. There are other requirements for observing employees when temperature is 89 degrees or above.

***What about interruptions in temperatures that interrupt the 14 days?***

**DOSH Response:** That is an interesting scenario that we may not have walked through. When the temperature hits one of those triggers, an employee that is newly assigned, they would need to be observed for the first 14 days and that observation should continue if that temperature dropped below the trigger temperatures. There wouldn't be a requirement for that day but should keep observation in place for those first 14 days of working. That is a good thing to consider and will help to assist in rulemaking and we will take that into consideration.

***So basically follow the 89 all summer as temperatures fluctuate between 75 and 100 day to day day to sunset.***

**DOSH Response:** Thank you for your comment, we will take that under consideration.

Meeting adjourned at 2:58pm.