

5. HEAT ACTION PLANS: A CAUTIONARY NOTE AND A WAY FORWARD

Aditya Valiathan Pillai



Source: David Trilling

Over the past three decades, heat extremes have given rise to a new tool in public policy: the heat action plan. These plans have a broadly similar flavor across the world; they define when and how the state should react to extreme heat and feature a script of actions that stretch across the breadth of government machinery. They are ambitious in scope, linking science, early warning systems, emergency aid, infrastructure change and coordinating institutions together.

Yet the very ambition of their scope creates a weakness: Without careful integration into existing workflows of government, they risk being overwhelmed by the conflicting priorities of daily administration and, eventually, ignored. Reviews of heat plans in democracies across the world, from India to the U.S. and Europe, suggest that they generally lack legislative or financial backing which makes them less likely to be implemented. This is perhaps unsurprising given that extreme heat is an emergent public health problem in a crowded field of policy priorities.

Unlike many other policy challenges, however, the nature of the problem is going to change in fundamental ways in the coming years. Several assessments, including the IPCC, point to more frequent, intense and longer heatwaves because of continued carbon emissions (IPCC, 2022). In governance terms, this means longer periods of low productivity and incomes for heat-exposed workers, an additional source of concentrated pressure on the health system (alongside a range of other hazards) and, almost inevitably, more suffering and deaths as adaptability limits are crossed.

Across much of the world, heat plans are aiming at a moving goalpost while struggling to adequately address

current challenges. A recent analysis of the implementation of heat plans in India, a country recognized as an early mover in heat planning, showed that the plans focus on important short-term emergency responses to heat (such as on water stations or on the designation of public cooling), while falling short in the implementation of long-term structural changes such as increasing shade coverage, changing building codes, or preparing the grid for future cooling demand.

An important area of future research is to find how common this focus on the short-term is across developing countries, where larger shares of the population are heat-exposed and state capacity is low. While the contents of heat action plans have been reviewed across regions, far fewer studies examine their implementation. Water provision, heat alerts and, in some places, drives to ensure workers have mandatory rest breaks, all pre-date the ascent of heat action plans. Social scientists and policy researchers must offer closer inspections of their actual effects on historical rhythms of summertime governance.

At this point, the reader might legitimately ask whether heat plans are even the right instrument for the structural changes needed to deal with 2 or 2.5°C of warming (or higher). The answer depends on: (a) whether they can find a reasonable way of incentivizing politicians and implementers to act and (b) whether they can do that in sector after sector, across the many areas they must intervene in.

To alter the incentives of local stakeholders, plans will have to acknowledge what they want and start working with the grain of local politics. They might have to offer up a set of visible actions that offer rewards to politicians and implementing bureaucrats; financial incentives that allow local governments to supplement politically attractive developmental expenditure in heat-related areas (such as for water supply infrastructure in a city approaching ‘day-zero’) and strong, inclusive monitoring frameworks that publicly repudiate or sanction ineffective implementation. A combination of all three might yield a consistently implemented plan.

At present, however, heat plans are written to be comprehensive rather than implementable. A focus on incentives and implementation—while remaining uncompromising on the determination of thresholds, vulnerability assessments and the specificity of solutions—suggests a productive way forward. We are yet to see plans that manage this balancing act. An example of how to solve this dilemma could help speed the rollout of heat protections as the climate warms. To be truly multi-sectoral, the second crucial element of efficacy, heat plans must be able to shift the priorities and routines of a range of departments. Most already attempt to do this. They establish coordinating institutions that can call meetings before, during and after heatwaves. They also designate responsibility for action to a team or individual, and thus serve the crucial function of establishing accountability within the state.

But the structure of these institutions is an important determinant of whether these plans will succeed. Since coordination is a function of power, what authority is the coordinating institution vested with? Does it have the imprimatur of the head of government, the head of the home department or some other powerful node of decision-making? Or is its remit limited to technical coordination, led by sectoral bureaucrats? Each of these options has its advantages and disadvantages; the former is more likely to sacrifice science to political imperatives, while the latter may not be able to shift the functioning of large, entrenched departments. The emerging trend of local governments appointing chief heat officers acknowledges the importance of allocating responsibility, but more research is needed to understand how to structure institutions to allocate power correctly in the case of heat policy.

This appraisal of the idea of heat planning cautions against triumphalism around the commissioning of

heat plans, which in most jurisdictions are signals of intent. Heat plans could lead to maladaptive outcomes if officials lose focus after earning plaudits for merely putting a plan in place. Heat proofing the future will require ensuring they can align science with political realities and outcomes by changing incentive structures.