

# T04P01 / Wicked Problems in Public Policy – From Theory to Practice

**Topic :** T04 / Problems and Agenda Setting

**Chair :** Joshua Newman (Monash University)

**Second Chair :** Brian Head (University of Queensland, Australia)

## GENERAL OBJECTIVES, RESEARCH QUESTIONS AND SCIENTIFIC RELEVANCE

In recent years, politicians and bureaucrats have expressed a desire to increase the use of evidence in policy-making. This narrative assumes a kind of linear, rational, or scientific trajectory for the use of knowledge in addressing policy problems – as if access to better quality information were the key to resolving important and difficult policy issues.

However, since the 1950s, there has been among scholars a growing dissatisfaction with the idea that some policy problems might be resolved through scientific methods or holistic design efforts – or more directly, that they might even be resolved at all. Inspired by colossal failures in social planning in the 1960s, the policy literature since the 1970s (starting with Rittel & Webber, 1973) has increasingly recognised that many issues are inherently difficult to manage or resolve, owing to increasing complexity in areas of social policy, significant differences in values, interests and perceptions, and uncertainty of outcomes and consequences that had previously gone unrecognised. This has presented something of a paradox, in that governments are increasingly demanding that policy appear to be more evidence-driven while academics (who produce much of this evidence) increasingly bring to light the challenges inherent in this task.

With this renewed emphasis on connecting evidence to policy, as well as the popular focus on ‘impact’ in academic research, it is time to re-examine the concept of wicked problems and the obstacles they present to linear, scientific models of policy decision-making. Are some policy problems wicked? How can the concept of wicked problems help us understand the inherent challenges of policy-making? Are some areas of policy more inclined to wickedness, or is all policy problems inherently wicked? How do complexity, uncertainty, and divergence of values and preferences intersect in processes of public policy?

This Panel is concerned with conceptualisations of wicked problems and the range of policy responses to wicked problems that are available to decision-makers. What are the key features of such problems? And are they really very different in nature from more routine problems? Are we developing better ways to address these wicked problems? How do approaches vary across different policy issues? How do different political-administrative cultures respond to complex challenges? Are some issues more ‘manageable’ in some institutional settings and political contexts than in other settings? Papers addressing theoretical, methodological, and practical matters in these areas are welcome.

## CALL FOR PAPERS

Some types of policy problems have been described as messy, complex, intractable, open-ended and ‘wicked’. The policy literature since the 1970s (starting with Rittel & Webber, 1973) has increasingly recognised that many issues are inherently difficult to manage or resolve, owing to increasing complexity in areas of social policy, significant differences in values, interests and perceptions, and uncertainty of outcomes and consequences that had previously gone unrecognised.

This Panel is concerned with conceptualisations of wicked problems and the range of policy responses to wicked problems that are available to decision-makers. What are the key features of such problems? And are they really very different in nature from more routine problems? Are we developing better ways to address these wicked problems? How do approaches vary across different policy issues? How do different political-administrative cultures respond to complex challenges? Are some issues more ‘manageable’ in some institutional settings and political contexts than in other settings? Papers addressing theoretical, methodological, and practical matters in these areas are welcome.

# T04P01 / Wicked Problems in Public Policy – From Theory to Practice

**Chair :** Joshua Newman (Monash University)

**Second Chair :** Brian Head (University of Queensland, Australia)

## Session 1

Friday, June 30th 08:15 to 10:15 (Manasseh Meyer MM 3 - 2)

### **New agendas for the study of wicked problems**

Brian Head (University of Queensland, Australia)

More than four decades ago, Rittel and Webber (1973) asserted that conventional approaches to scientific analysis and rational planning were inadequate for guiding practitioners and

researchers tackling complex and contested, or 'wicked', social problems. Policy analysts, academic researchers and planning practitioners grappled with the claim that conventional scientific-technical approaches might be inappropriate for understanding and responding to complex social issues. This critical perspective continues to challenge modern notions of evidence-based policymaking, policy evaluation, and performance-based public management.

The wicked problems literature generally contends that special methods are needed for addressing highly contested arenas of policy and planning. This is because the plurality of views about the problems and solutions are anchored in differing values and perceptions, which cannot be adjudicated and settled by empirical science, but require inclusive processes of argumentation and conflict resolution among stakeholders.

However, there are strong arguments for attempting to 'mainstream' wicked problem analysis by linking these policy challenges more clearly to the current policy literature on public policy problem framing, policy design and implementation, and to the contextual literature on how leaders and managers cope with crises, complexity and conflict. This amounts to seeking a 'second generation' of wicked problems scholarship.

### **Understanding the governance of wicked problems from the perspectives of sensemaking and decision-making**

Dewulf Art (Wageningen University)

Is life about choice or is life about meaning? Sensemaking and decision-making represent rather different perspectives on different types of human activities, but the governance of wicked problems poses serious challenges for both sensemaking and decision-making. Decision-making is very much concerned with the future and the possibilities it holds, and aims to overcome uncertainty to make choices possible. In contrast, sensemaking is primarily about attaching meaning to actions and events that have already occurred. A sensemaking perspective emphasizes the continuous flow of action and interaction, in which people struggle to overcome ambiguity about the significance of our own and others' experiences and actions. Can our understanding of the governance of wicked problems be furthered by linking decision-making and sensemaking theories? In conditions of high uncertainty and ambiguity, sensemaking is decisive through shaping the meaning of decision problems, decision options and decision outcomes. At the same time, decisions are occasions for sensemaking: through decisions, people define policy issues and identities, and they enact the wicked problem environment they later need to interpret. Developing a sensemaking perspective on decision-making about wicked problems opens up research avenues that have been understudied in public administration, policy and governance research. These include studying decisions as enactments and occasions for sensemaking, developing sensemaking-support systems, making sense of dualities in decision-making, and prospective sensemaking for long-term decision-making.

## **Lost in translation: policy implementation to address health inequities as a ‘wicked’ problem**

Matthew Fisher (Flinders University of South Australia)

Fran Baum (Flinders University)

Sharon Friel (The Australian National University)

Socially determined health inequities have been recognised as a ‘wicked problem’, meeting Rittle and Webber’s conception of a policy problem that is complex, involves multiple, interacting causal factors, resists simple solutions, and cuts across the responsibilities of numerous government departments. Policy implementation processes can affect how and to what extent policy intentions are realised in practice, with implications for health inequity. This paper will bring together theory and evidence on the social determinants of health, the concept of wicked problems, and current theory-informed research on policy implementation to address two main questions:

- Is the concept of wicked problems useful in understanding health inequities as a policy problem?
- How can implementation processes affect effective policy action on health inequities?

The paper will draw on current work on policy implementation in Australia under the NHMRC Centre of Research Excellence on the Social Determinants of Health Equity: Policy research on the social determinants of health equity. It will apply theory on policy implementation, including Howlett, Ramesh and Perl’s (2009) ‘Ideas, Actors and Institutions’ framework, and use conceptual frameworks on social determinants of health. Drawing on examples of policy action in an Australian context, the paper will focus on health inequities as a complex problem involving multiple causal factors. It will argue that current policy actions to address health inequities have limited success because problem conceptions embedded in policy actions – as influenced by political actors – along with the structures and operational norms of public policy institutions, fail to come to terms with the complexity of the problem. The paper will draw on evidence to propose alternative policy approaches likely to have more success. In conclusion, the paper will discuss the utility of the concept of wicked problems for public health research and policy addressing health inequities.

# T04P01 / Wicked Problems in Public Policy – From Theory to Practice

**Chair :** Joshua Newman (Monash University)

**Second Chair :** Brian Head (University of Queensland, Australia)

## Session 2

Friday, June 30th 10:30 to 12:30 (Manasseh Meyer MM 3 - 2)

### **Unpacking the implications of labelling environmental issues as 'wicked problems'**

Brian Coffey (RMIT University)

Policy issues are frequently characterised as wicked problems. Conceptually, such a view is informed by Rittel and Webber's seminal work from 1973 'Dilemmas in a general theory of planning' which distinguished between 'tame' and 'wicked' policy problems. Wicked problems defy definition and definitive solution. However, the implications of labelling policy problems as wicked are often overlooked. This paper explores conceptual and practical implications associated with the concept and its application, with a particular focus on environmental policy discourse. It is argued that exploring how, when and why environmental issues come to be viewed as wicked, and with what effect, provides richer insights into the dynamics of policy making than does labelling environmental issues as 'wicked problems'.

### **Intractable Water Conflict as a Wicked Problem: Two Case Studies in Mexico**

Raul Pacheco-Vega (Facultad Latinoamericana de Ciencias Sociales (FLACSO) Mexico)

The notion of intractable water conflict (protracted, highly-contested, apparently non-solvable) is perhaps the best example of a wicked problem. The literature on conflict resolution offers some insight into how we can best approach water conflicts towards a solution, but what shall we do when we encounter case studies where there is no apparently solvable issue? This paper will use examples from three intractable water conflicts (El Zapotillo and La Parota's dam and aqueduct projects) to discuss whether there is any sort of reasonable expectation of solution and to what extent intractability is a function of the type of project, the specificities of water policies and the local contexts.

### **Ten Ways to Fail: Disaster Management in the Wicked Problems Framework**

David Kasdan (Sung Kyun Kwan University)

Is disaster management a wicked problem? The notion of 'wicked problems' has held an unfortunate prominence in planning and administration management for decades. While it has been applied to an array of public issues, the framework that qualifies a problem as "wicked" has rarely been used in emergency management and disaster risk reduction efforts, despite a convincing coherence between the concepts. This research posits that the wicked problem framework is valid for understanding and improving disaster management on three points: it gives access to the significant research on network and organizational collaboration; it bolsters the call for inter-disciplinary approaches; and it can help to improve disaster risk reduction strategies by formulating realistic policy objectives.

The concept of "wicked problems" was introduced to describe the challenges of planning in a time when there were growing reservations about the legitimacy of the profession in light of failures to provide solutions for every situation, conceivable or not. They were responding to the critics of professionalism who had doubts that planners were really bringing any value to modern problems. The old problems of a material nature had been met by capital solutions of engineering and technology; housing, sanitation, transportation, and other concerns of society could be fixed by competent professionals using solutions that were similarly definable, understandable, and consensual.

Disaster management has many parallels to the planner's predicament years ago. Technology and

engineering solutions have addressed most of the problems that are definable, understandable, and consensual. But so much of disaster management is undone by the elements of disasters that do not fit in those qualifications. There is now need for confronting the more stubborn and pernicious problems in protecting populations. Modern society has adopted solutions to normal problems by coupling risk and complexity in systems so entangled that they cannot avoid consequences and repercussions beyond imagination. The linear problems in disaster management – which are few – are mostly resolved by natural sciences as they fit the research paradigm. It is the complexity of social concerns surrounding disaster management that prove most wicked: political motivations, economic constraints, and behavioral anomalies challenge disaster management efforts. The call for multi-/inter-disciplinary approaches to DRM and growing concern from sociologists, environmentalists, psychologists, and fields outside of the “hard solutions” camp suggests that a paradigm shift may be in order for disaster management.

This paper is an evidence-based theoretical argument that begins by drawing the parallels between planning and disaster management, then proceeds to apply the ten characteristics of wicked problems to disaster management. Following that, several cases of disasters are presented to portray how the wicked problem issues have been realized in practice. The conclusion offers ways that the wicked problem approach from planning and administration research can be extended into disaster management to improve outcomes in disaster risk reduction and hazard mitigation.

# T04P01 / Wicked Problems in Public Policy – From Theory to Practice

**Chair :** Joshua Newman (Monash University)

**Second Chair :** Brian Head (University of Queensland, Australia)

## Session 3

Friday, June 30th 13:45 to 15:45 (Manasseh Meyer MM 3 - 2)

### **Affordable lifelong housing or urban social sustainability? Morphogenesis of an almost super wicked problem amidst rapid developmentalism**

Daniel Rong Yao Gan (National University of Singapore)

Given confluence of unprecedented migratory flows and rise of single-person households in developed and newly developed states, traditional emphasis on developmentalism as the panacea to various global wicked problems may no longer suffice in view of eroding assumptions. A country's urban social phenomenon often may no longer be contained within its own boundaries. This warrants a closer look at urban social trends and the interstitials of cities' housing and (regional) migratory policies, especially at ideal developmental states where the promises of developmentalism seem brightest and most operative due to proficient governance.

Using wicked and super wicked problems and strategies as analytical frames, this paper examines the origins and parallel developments of discourses on urban social sustainability and affordable lifelong housing, and comparatively outlines their current states, eschewing the nature of their wickedness. What are these wicked problems symptoms of? What are their common roots, if any? How do they differ and inform or cover the blind spots of each other?

Based on a systematic review of existing key theories and mechanisms, and their applications in Singapore's case, this paper identifies perspective differences embedded in these framings of the root issue(s) and concomitant policy solutions. With references to related planning and health or wellbeing research and policies, this paper suggests that the granularity of (socio)physical scale under consideration needs refinement while maintaining a broad view of the almost super wicked problem; at the same time, it points to the plausible and less visible cost of rapid developmentalism, further refining the problem definition for formulation. In the end, this paper will present preliminary future research areas corresponding to the wickedness of the problem at hand, reemphasizing interdisciplinary dialogue and collaborative agenda setting.

### **Conceptualizing the problem of 'unwanted girls' and analyzing the Indian state's response**

Advaita Rajendra (Indian Institute of Management, Sirmaur)

Ankur Sarin (Indian Institute of Management Ahmedabad)

Navdeep Mathur (Indian Institute of Management, Ahmedabad)

How does the state see the problem of 'unwanted girls'? Partly manifested in acts of sex-selective abortion, female infanticide and abandonment of girl infants, the "unwantedness" of a girl child manifests and is reinforced by varying forms of oppression that may be understood as 'coercions' and unquestioned daily practices (West & Zimmerman, 1987; Young, 2011). However, the Indian state in its vision and treatment is either unable or unwilling to grapple with the "wickedness" of the problem.

A wicked problem is one that is highly complex, uncertain and divergent (Head, 2008; Rittel & Webber, 1973a). With its roots in the pervasive and knotty structure of patriarchy, manifestation in varying contexts and its diverse formulations (informed by one's assumptions), we point to the value of using the frame of a wicked problem to make sense of policy initiatives made by the Indian state towards addressing the problem of "unwantedness". In particular, we study cases of financial incentives and "cradle" schemes, as attempts of the Indian state to respond to the problems of "unwanted" girls.

We first describe the heavy reliance on conditional cash transfers to address the issues identified by the

state, particularly since the turn of the century. Under the policy, financial incentives have been extended to families from having a girl child to enrolling her to school at different grades and saving for her marriage or higher education are some of them. The other policy we study is “cradle” programs that have been implemented in two states in India, Tamil Nadu (1992) and Rajasthan (2016) that require selected spaces to have cradles placed in which parents could ‘safely’ abandon their girl child.

From a close reading of the policy design and official discourse around these policies, we point to ways the state appears to frame the problem, the dimensions it responds to and what it ignores. In correspondence to Schneider & Ingram's (1993), we argue that only the most visible facet of a ‘dependent’s’ oppression is catered to. Further, if the sex ratio and school enrolments are the only information we think we need to deal with the problem of ‘unwanted girls’, offering a solution similar to the cradle scheme or the financial incentives is almost “concomitant” (Rittel & Webber, 1973) We argue that both these interventions look at oppression very narrowly – in the form of violence or more overt forms of exploitation (Young, 2011), while leaving out subtle but pertinent forms of oppression. The already low and falling sex ratio<sup>[1]</sup> in India often makes headlines and is a legitimate target for policy intervention. But while the results may be more visible in the short term (aided by tangible goals and key number like sex ratio, school enrolment ratio), these policies run the risk of ignoring and at worst reinforcing the negative social construction around girls (Dreze, 1997; Johari, 2015).

#### References:

- Dreze, J. (1997, September 29). Government grants and the girl child. Times of India, 29. Times of India. India. Retrieved from <http://search.proquest.com/hnptimesofindia/docview/613987080/27A3FFE118DE435APQ/4?accountid=27540>
- Head, B. W. (2008). Wicked problems in public policy. *Public Policy*, 3(2), 101–118.
- Johari, A. (2015, January 23). As Modi launches another girl child scheme, here's why previous initiatives in the area failed. Scroll.in. Retrieved from <https://scroll.in/article/701730/as-modi-launches-another-girl-child-scheme-heres-why-previous-initiatives-in-the-area>
- Rittel, H., & Webber, M. M. (1973a). Dilemmas in a general theory of planning. *Policy Sciences*, 4(2), 155–169.
- Rittel, H., & Webber, M. M. (1973b). Planning problems are wicked. *Polity*, 4, 155–169.
- Schneider, A., & Ingram, H. (1993). Social construction of target populations: Implications for politics and policy. *American Political Science Review*, 87(02), 334–347.
- Schneider, A. L., & Ingram, H. (2008). Social constructions in the study of public policy. In J. A. Holstein & J. F. Gubrium (Eds.), *Handbook of constructionist research* (pp. 189–212). New York: Guilford Press.
- West, C., & Zimmerman, D. H. (1987). Doing Gender. *Gender & Society*, 1(2), 125–151. <https://doi.org/10.1177/0891243287001002002>
- Young, I. M. (2011). *Justice and the politics of difference*. Princeton: Princeton University Press.

[1] 918 girls in the age of 0-6 for every 1000 boys in 2011. A further dip from 927 in 2001 (Census 2001 and 2011)

### **Identifying Policy Problems Through A Problem Structuring Flowchart: Cases of "Wicked" Problems from the Philippines**

Ebinezer Florano (University of the Philippines Diliman)

Identifying the right policy problem is an important step in policy analysis, yet the most difficult one. It becomes messy or stays unresolved due to wrong problem identification (a.k.a. "wicked"). In the words of Russel Ackoff, “successful problem solving requires finding the right solution to the right problem. We fail more often because we solve the wrong problem than because we get the wrong solution to the right problem.” The paper will revolve around the questions: How do we convert a situational problem to policy problem? How do we relate situational problems to public policies? What are the various types of policy problems that can emerge from the assessment of existing ones? By using a flowchart designed by the author, the paper will identify four types of policy problems using concrete examples from the Philippines on environmental problems, i.e., compliance with the mining law, analyzing drug residues in fresh meat, traffic congestion in a national highway, and water management in agriculture. These problems were subjected to steps of the Problem Structuring Flowchart. The cases that emerged include those that involve policy conflict, policy defects/shortcomings, inappropriate policy, and the lack of policy on the problematic area.

With the right identification of the policy problem, the specification of policy alternatives or the right policy solution becomes easier.