What Predicts Government Trustworthiness in Nuclear Safety Emergency Governance in Hong Kong?

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Abstract

China has picked nuclear power as a key solution to reduce carbon emissions. However, ongoing concerns about nuclear safety of the new and existing nuclear power plants (NPPs) situated in the Guangdong Province have consistently heightened fears of the Hong Kong (HK) public towards China’s cross-border nuclear safety emergency governance (NSEG). A survey of 1032 HK respondents was conducted in 2015 to identify the key factors predicting HK government trustworthiness in cross-border NSEG. Based on the Principal Component Analysis, our results show that self-identification as Chinese citizens is the most significant predictor of overall perceived government trustworthiness. The higher the respondent’s identification as a Chinese citizen, the greater he/she perceives that the HK government is trustworthy. This is followed by risk perceptions about nuclear power plants (NPPs). The higher one’s risk perception towards NPPs, the less the overall perceived government trustworthiness. Finally, yearly income is negatively correlated with perceived trustworthiness. Nevertheless, engagement levels, and knowledge about nuclear power and safety governance have no effects on perceived government trustworthiness. This contradicts our original hypothesis that engaging the public will increase public trust in the HK government’s cross-border NSEG. Further, our PCA result implies that spoon-feeding the public with more knowledge will not improve perception towards HK government’s trustworthiness in NSEG. Our analysis shows that for effective NSEG in HK, the government should direct attentions towards improving HK people’s self identification as Chinese citizens, and reducing public fears towards NPPs, with attention paid especially to the three risk dimensions that contribute most significantly to public fears, including the voluntariness, severity of consequences and control over risk of nuclear technologies.
Our trust model on NSEG in HK can be transferrable to countries where public concerns about nuclear safety are significant.