Strengths of current dengue maps	Opportunities for future dengue maps
Identify areas that are historically more susceptible to dengue	Improve the availability of data and decrease costs of acquiring
	data
Use advanced spatial analysis techniques	Increase access to new GIS technology by reducing the cost of
	software
Use multi-level modeling (such as Combinatorial Complexity	Incorporate additional dengue variables, such as information
Analysis)	about migration
	Inform epidemiologists, geographers, and citizens to utilize GIS
	Maps to identify existing dengue conditions
	Capture data systematically through ongoing data collection and
	reporting
	Provide a wider use of tools like MosquitoMap and DengueMap
	(internet data collection and geospatial data sharing)
	Improve stronger evidentiary base for targeted dengue
	prevention and control activities by increasing public awareness
	of risks
	Analyze existing models to create a platform for future multi-
	level models
Weaknesses of current dengue maps	Threats for future dengue maps
Are challenged by clinically indistinguishable dengue fever	Require potentially pricy laboratory testing to validate possible
symptoms	cases
Rely on limited data sources (and therefore limit the currency	Lack sufficient resources for systematically capturing, identifying
and timeliness of maps)	, and storing GIS data
	Need to ensure the confidentiality of personal data
Involve complex spatial analysis methods which cannot be	Require equally complete or reliable data for
conducted without specialized (and often prohibitively	rural and urban areas
expensive) software packages	Turar and urban areas
Focus on the global scale and are too coarse for local use or	Differ in their data compilation methods, which do not promote
focus on the local scale and are to fine for global use	data accuracy and data sharing

David Frost Attaway et al. Assessing the methods needed for improved dengue mapping: a SWOT analysis.