

## Supplementary material

**Table S1:** GW systems removal efficiency of each quality index.

Treatment Types	GW System	TSS	Turbidity	COD	BOD5	TN	TP	Faecal Coliform	Reference
Physical Treatment	Screening+ Sedimentation+ Disinfection	57.7%	17.5%	54.4%	N/A	37.7%	N/A	N/A	March et al. (2003)
Biological Treatment	RBC	92.8%	98.0%	79.0%	96.0%	N/A	N/A	100.0%	Gross et al. (2015) & Abdel Kader (2012)
Advanced Treatment	Electro-Coagulation	69.0%	91.6%	60.0%	61.0%	60.0%	65.0%	N/A	Piduo (2006), Lin et al. (2005), & Ozyonar et al. (2010)
Biological Treatment	MBR	99.0%	98.5%	97.0%	99.0%	68.5%	19.0%	100.0%	Friedler et al. (2006) & Boana et al. (2020)
Natural based Treatment	CW	98.0%	91.0%	93.0%	98.0%	59.0%	63.0%	100.0%	Boana et al. (2020)