

will create an effective index that acts as an indicator in determining the sustainability of PBO's location through GIS-based decision-making approach. Table 3 shows final findings of sustainability of PBO's location in all research areas.

Table 3 Sustainability of PBO's location index

LOCATION	GT	CBD	WCC	SUB
Location of commercial feature	0.136	0.3874	0.3336	0.28
Availability of transport options	1.6938	0.1283	0.4095	0.2368
Transportation distance	0.538	1.0878	0.6312	0.5245
Vehicle flow	0.1286	0.1	0.0761	0.0588
Efficiency of property market	0.0682	0.0341	0.032	0.0398
Total	2.5646	1.7376	1.4824	1.1399
Index % (Average)	85.4	57.92	49.4	37.9

6. Conclusion

This research has utilised GIS-based decision-making approach to fit with the local environment in quantifying the level of sustainable location characteristics that usually involved more subjective element. Through the justification on the current GIS-based decision making approach, it has given its own uniqueness on the research where the occupants' orientation of the sustainability measurement method for locational characteristics of PBO was introduced. In this research, the researcher has introduced GIS-AHP method. Findings obtained through the application of this method are in index form that can be used as an indicator in identifying the sustainability level of each PBO location's characteristic evaluated.

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