



INTRODUCTION

- 7.1% of all families in Malaysia with children were vulnerable to food insecurity, including both adults and children.¹
- Adolescents with food insecurity have higher chances of hospitalization, nutritional deficiency and mental disorder.^{2,3}

OBJECTIVE

To study the association between food security with dietary habits and growth status of adolescents in Malaysia.

METHODOLOGY

Study design: Cross Sectional study

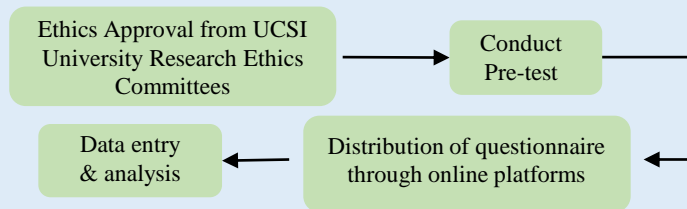
Sampling technique: Snowball and Convenience sampling

Sampling size: 143 adolescents (aged 10-17 years)

Research instruments:

- Socio demographics characteristics (by parents)
- Food security status⁴ (by parents)
- Anthropometric measurement (by parents)
- Dietary habits⁵ (by adolescents)

Research Procedure



RESULT AND DISCUSSION

Socio demographic details



Parents

45.57±6.87 years old
 Female (72.7%)
 Chinese (71.3%)
 Tertiary Education (58.0%)
 M40 (61.5%)
 2-4 household member (47.6%)
 Central region (51%)



Adolescents

14.92 ± 2.24 years old
 Female (61.5%)
 Chinese (71.3%)
 Secondary level education (81.8%)

Socio demographic details



Adolescents

14.92 ± 2.24 years old
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Food security status

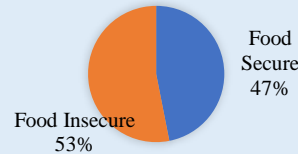


Figure 3: Food security status

Table 2: Association between food security status with parent's sociodemographic

Variables	X ²	P-Value
Parent's education level	6.917	0.031
Monthly household income	12.386	0.002

*Significant difference at p-value < 0.05

RESULT AND DISCUSSION

Table 1: Association between household food security status with growth status

	Food Secure	Food Insecure	X ²	P-value
BMI-for-age			0.390 ^a	0.898
Severely thin/thinness	4 (6.0)	3 (3.9)		
Normal	52 (77.6)	60 (78.9)		
Overweight and obese	11 (16.4)	13 (17.1)		
Height-for-age			0.250	0.617
Severely stunted and stunting	7 (10.4)	10 (13.2)		
Normal	60 (89.6)	66 (86.8)		
Tall or very tall	0 (0)	0 (0)		

^a = Fisher's Exact (FE) test was used when cells have expected count less than 5.

Table 2: Association between frequency of snacks in past week with gender differences

Snacks	male	Female	x ²	P-value
Never	33 (60.0)	68 (77.3)	4.868	0.027*
≥Once/week	22 (40.0)	20 (22.7)		

*Significant difference at p-value < 0.05

Significant differences between food security status and sociodemographic factors

No significant differences between food security status and dietary habits

- Food security status is not associated with adolescents' anthropometric parameters.
- Sex differences affect the snacking habits among adolescents.
- Food security status does not affect adolescents' dietary habits.
- Socio demographic factors affects the food security status.

CONCLUSION

This study showed inadequate dietary intake occur in food security and food insecure Malaysian adolescents.

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