



## The relationship between age and parity with the incidence of hyperemesis gravidarum in pregnant women at inpatient puskesmas Kota Karang Bandar Lampung in 2020

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### ABSTRACT

Hyperemesis gravidarum in pregnant women can be identified if pregnant women experience vomiting every time they eat and drink or in a day the mother experiences several vomiting and can also be accompanied by weight loss. The incidence of Hyperemesis Gravidarum according to the World Health Organization reaches 12.5% of all pregnancies in the world and in Indonesia reaches 14.8% of all pregnancies and in Lampung Province reaches 10-15%. Knowing the relationship between age and parity with the incidence of Hyperemesis Gravidarum in pregnant women at the Inpatient Puskesmas Kota Karang in 2021 is the aim of this study using quantitative research with a total population of all pregnant women in the working area of the Puskesmas Kota Karang in 2021 with a sample of 78 people use case control. prevalence of pregnant women experiencing Hyperemesis Gravidarum was 56.4%, the risk of experiencing Hyperemesis Gravidarum was due to the age factor of 57.7% and the parity at risk of experiencing Hyperemesis Gravidarum was 57.7% so that the relationship between age and parity with the incidence of Hyperemesis Gravidarum was obtained. in pregnant women at the Inpatient Puskesmas Kota Karang by showing a p value: 0.01 or less than 0.05. The results of this study are expected to be input for residents of kota karang, Teluk Betung Timur, kota Bandar Lampung regarding the prevention and treatment of hyperemesis gravidarum in pregnant women so that they can reduce the incidence of hyperemesis gravaidum.

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### ABSTRAK

Hiperemesis gravidarum pada ibu hamil dapat diidentifikasi apabila ibu hamil mengalami muntah pada setiap makan dan minum atau dalam sehari ibu mengalami beberapa kali muntah dan dapat juga disertai dengan penurunan berat badan. Angka kejadian hiperemesis gravidarum (HEG) menurut WHO sebesar 12,5% dari jumlah seluruh ibu hamil dan di Indonesia mencapai 14,8% dari seluruh kehamilan serta pada Provinsi Lampung mencapai 10-15%. Mengetahui hubungan usia dan paritas dengan kejadian hiperemesis gravidarum pada ibu hamil di Puskesmas Rawat Inap Kota Karang tahun 2021 adalah tujuan dari penelitian ini dengan menggunakan penelitian kuantitatif dengan jumlah populasi adalah seluruh ibu hamil di wilayah kerja Puskesmas Rawat Inap Kota Karang Tahun 2021 dengan sampel berjumlah 78 orang menggunakan case control. Hasil penelitian diperoleh prevalensi kejadian ibu hamil mengalami hiperemesis gravidarum sebanyak 56,4%, berisiko mengalami kejadian hiperemesis gravidarum karna faktor usia sebanyak 57,7% serta paritas berisiko mengalami hiperemesis gravidarium ialah 57,7% sehingga didapatkan hubungan usia dan paritas dengan kejadian hiperemesis gravidarium pada

ibu hamil di Puskesmas Rawat Inap Kota Karang dengan menunjukkan nilai p value: 0,01 atau kurang dari 0,05. Hasil penelitian ini diharapkan dapat menjadi masukan bagi warga Kota Karang Kecamatan Teluk Betung Timur Kabupaten Bandar Lampung tentang pencegahan dan penanganan hiperemesis gravidarum pada ibu hamil sehingga dapat menekan angka kejadian hiperemesis grvidaum.

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## INTRODUCTION

Hyperemesis Gravidarum can be interpreted as severe vomiting where there is expenditure of all food and drink consumed by pregnant women which occurs in pregnancies less than 20 weeks which can cause weight loss, interfere with daily life causing the general condition to decrease and in laboratory examinations obtain acetone in the urine that is not caused by other diseases (Nugroho, 2015).

One of the complications experienced by pregnant women in the first trimester is Hyperemesis Gravidarum. the percentage of pregnant women who experience Hyperemesis Gravidarum is 40-60% occurring in multigravid pregnant women and around 60-80% occurs in primigravid pregnant women, with a frequency of 1 in 1000 pregnancies who experience nausea and vomiting are at risk for multigravida mothers ( Kristina, 2020).

The exact cause of hyperemesis gravidarum is not known, but several predisposing factors can cause hyperemesis gravidarum, namely parity, hydatidiform moles, multiple pregnancies (Prawirohardjo, 2015). The risk factor for maternal age is the risk factor most often associated with hyperemesis gravidarum because it is related to the psychological condition of pregnant women. Mothers who are at risk are more likely to experience hyperemesis gravidarum where mothers who are less than 20 years old are not mentally and psychologically ready to undergo pregnancy and age over 35 years is a risky age for pregnant women. a risk factor for Hyperemesis Gravidarum is Gestational age, which is related to levels of the hormone chorionic gonadotropin, progesterone and estrogen in the mother's blood. (Atika, 2018)

Puskesmas Kota Karang is one of the inpatient health centers in Lampung Province, based on the results of a preliminary survey at the Puskesmas Kota Karang there was an increase in cases of Hyperemesis Gravidarum in 2018 there were 102 cases out of 228 pregnancies (44.7%), in 2019 there were 112 cases from 220 pregnancies (50.9%), and in 2020 there will be an increase of 409 cases from 498 pregnancies (82.1%). The incidence of Hyperemesis Gravidarum at the Inpatient Puskesmas Kota Karang As of April - September 2021 there were 105 cases of 169 pregnancies (62.1%). (Medical Records of the Inpatient Puskesmas Kota Karang, 2021).

the author is interested in carrying out research with the title "Relationship between Age and Parity with the Incidence of Hyperemesis Gravidarum at the Inpatient Puskesmas Kota Karang in 2021".

## METHODS

this study is using quantitative research with a total population of all pregnant women in the working area of the Puskesmas Kota Karang in 2021 with a sample of 78 respondent use case control by using purposive sampling in this study and analyzed using the chi square test

## RESULTS AND DISCUSSION

**Table 1.**  
**Frequency Distribution of HEG at the Inpatient Puskesmas Kota Karang in 2021**

No	Hyperemesis Gravidarum	Frequency	
		N	%
1	Hyperemesis No	44	56,4
2	hyperemesis	34	43,6
<b>Total</b>		<b>78</b>	<b>100</b>

Based on the table above, out of 78 pregnant women, 44 (56.4%) had experienced hyperemesis gravidarum

**Table 2**  
**Age Frequency Distribution of Respondent Mothers at the Inpatient Puskesmas Kota Karang in 2021**

No	Mother's Age	Frequency	
		N	%
1	At risk (<20 / >35 years)	46	59
2	Not at risk (20/ ≤35 years)	32	41
<b>Total</b>		<b>78</b>	<b>100</b>

Based on the table above, out of 78 pregnant women, 46 were found to be at risk (59%)

**Table 3**  
**Frequency Distribution of Parity at the the Inpatient Puskesmas Kota Karang in 2021**

No	Parity	Frequency	
		N	%
1	At risk (1 and >3)	45	57,7
2	No Risk (2 and 3)	33	42,3
<b>Total</b>		<b>78</b>	<b>100</b>

Based on the table above, out of 78 pregnant women, 45 (57.7%) parity pregnant women were at risk

**Table 4**  
**Correlation between Age and HEG at the Inpatient Puskesmas Kota Karang in 2021**

Age	Hyperemesis Gravidarum				Total		p-value	OR (95% CI)
	At risk		No Risk		N	%		
	N	%	N	%				
At risk	33	75%	13	38.2%	46	59.0%	0.002	4,846 (1,834-12,805)
No Risk	11	25%	21	61.8%	32	41.0%		
<b>Total</b>	<b>44</b>	<b>100%</b>	<b>34</b>	<b>100%</b>	<b>78</b>	<b>100%</b>		

based on Chi-Square analysis it can be seen that P value = 0.002 less than 0.05 this can be defined that there is a relationship between Maternal Age and the Incidence of HEG in Pregnant Women at the inpatient Puskesmas in Kota Karang in 2021. The OR value was obtained. = 4.846 (1.834 – 12.805) means that mothers at risky age have a 4.846 times greater chance of hyperemesis gravidarum than those who are not at risk.

**Table 5**  
**Correlation between Parity and HEG an the inpatient Puskesmas Kota Karang in 2021**

Parity	Hyperemesis Gravidarum				Total		p-values	OR (95% CI)
	At risk		No risk		N	%		
	N	%	N	%				
At risk	33	75.0%	12	35.3%	45	57.7%	0.01	5,500 (2,064-14,654)
No Risk	11	25.0%	22	64.7%	33	42.3%		
<b>Total</b>	<b>44</b>	<b>100%</b>	<b>34</b>	<b>100%</b>	<b>78</b>	<b>100%</b>		

based on Chi Square analysis it can be seen that P value = 0.002 less than 0.05 this can be defined that there is a relationship between parity and the Incidence of HEG in Pregnant Women at the inpatient Puskesmas Kota Karang in 2021. The relationship between the two variables is obtained by OR = 5.500 (2.064–14.054) meaning that mothers with parity at risk have a 5.5 times greater chance of hyperemesis gravidarum than those with parity not at risk.

From the results of the study, it was found that there were 33 (75.0%) pregnant women at risk of experiencing hyperemesis gravidarum. over 35 years old can be caused by stress because they are not ready to get pregnant again.

This is in accordance with Prawirohardjo's theory (2013), factors that can cause hyperemesis gravidarum are parity, multiple pregnancies, high estrogen and HCL, mylahidatidosa, organic factors, and psychological factors. Meanwhile, according to Bobak (2015), namely maternal age, obesity, multiple pregnancy and hydatidiform mole.

## CONCLUSIONS AND SUGGESTIONS

### a. Conclusions

Based on research conducted on the relationship between age and parity with the incidence of hyperemesis gravidarum in pregnant women at the inpatient Puskesmas Kota Karang in 2021, it can be concluded:

1. Frequency Distribution of Pregnant Women Experiencing Hyperemesis Gravidarum Events As many as 44 (56.4%).
2. DistributionThe frequency of at-risk ages experiencing hyperemesis gravidarum was 46 (59.0%).
3. Frequency Distribution of At-Risk Parity Experiencing Hyperemesis Gravidarum Events As many as 45 (57.7%).
4. obtained the relationship between age and HEG in pregnant women at the inpatient Puskesmas Kota Karang in 2021 with a p value 0,02
5. obtained the relationship between parity and HEG in pregnant women the inpatient Puskesmas Kota Karang in 2021 with a p value 0,01

### b. Suggestions

It is hoped that health workers, especially midwives/nurses, can provide information to pregnant women about the importance of having a pregnancy checked, explain sincerely and patiently in dealing with pregnancy so that they can prevent hyperemesis gravidarum. easy to understand language. not in medical language so that pregnant women can understand and expect health workers to provide services based on established service standards.

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