



## Short Communication

# Evaluation of Diagnostic Value of Amniotic Fluid Ferritin and Its Relation to the Pregnancy Complications

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### Abstract

**Introduction:** The health of the child is in close relation with the health of the mother and his access to health care. Among these services, it is possible to perform prenatal care with the aim of identifying risk factors and predicting and preventing pregnancy complications.

**Methodology:** This descriptive-analytic study was performed on all pregnant women referring to the clinic of Amiral-Momenin Hospital in Zabol in 2017; pregnant mothers with gestational age more than 20 weeks.

**Results:** The present study was conducted on 100 pregnant women referring to the clinic of Amiral-Momenin Hospital in Zabol in 2017; the mean age of studied subjects turned out to be 29.86 ± 6.22 years.

**Discussion and conclusion:** The results of this study showed that the mean ferritin level in women with preeclampsia and premature rupture of membrane was significantly higher than healthy women without complications of pregnancy; however, ferritin in the other complications of pregnancy, including Gestational diabetes, fetal abnormalities, placental abruption, and oligohydramnios were not statistically different with healthy pregnant women.

### Keywords

Ferritin; Pregnancy; Zabol; Placental abruption; Abnormalities

## Introduction

The health of the child is in close relation with the health of the mother and his access to health care. Among these services, it is possible to perform prenatal care with the aim of identifying risk factors and predicting and preventing pregnancy complications [1]. Here's a brief overview of some of the common complications of pregnancy.

## Methodology

This descriptive-analytic study was performed on all pregnant women referring to the clinic of Amiral-Momenin Hospital in

**Table 1:** Comparison of mean ferritin level in pregnant women with preeclampsia and eclampsia and healthy subjects.

Group	ferritin	P value
Positive preeclampsia	92.25 ± 14.81	0>0001
Negative preeclampsia	37.48 ± 13.29	
Positive diabetes	8.38 ± 33.28	0.148
Negative diabetes	37.48 ± 13.29	
Positive oligohydramnios	10.29 ± 46	0.219
Negative oligohydramnios	37.480. ± 13.29	
Positive placental abruption	9.19 ± 35.5	0.605
Negative placental abruption	37.48 ± 13.29	
Positive fetal abnormalities	6.42 ± 31	0.148
Negative fetal abnormalities	37.48 ± 13.29	
Positive premature rupture of membrane	15.32 ± 88.90	0.148
Negative premature rupture of membrane	37.48 ± 13.29	

Zabol in 2017; pregnant mothers with gestational age more than 20 weeks, single-strike pregnancy and satisfaction to enter the study were the main inclusion and proven systemic infections, diabetes, hypertension, pre-pregnancy, internal disease, mental illness, smoking, non-Iranian nationality, Corticosteroids consumption and immune stimulants in the last 4 weeks and the use of Non-steroidal anti-inflammatory medicines were the main exclusion criteria. The collected data was analyzed using SPSS18 and descriptive statistics in form (frequency tables and charts) (Table 1).

## Findings

The present study was conducted on 100 pregnant women referring to the clinic of Amiral-Momenin Hospital in Zabol in 2017; the mean age of studied subjects turned out to be 29.86 ± 6.22 years.

## Discussion and Conclusion

The health of the child is in close relation with the health of the mother and her access to health care. Among these services, it is possible to perform prenatal care with the aim of identifying risk factors and predicting and preventing complications of pregnancy [2]. The aim of this study was to evaluate the diagnostic value of amniotic fluid lactate dehydrogenase and its relationship with pregnancy complications in pregnant women with gestational age greater than 20 weeks referred to the clinic of Amiral-Mu-menin Hospital in Zabol in 1395. The mean age of studied subjects turned out to be 29.86 ± 6.22 years. The mean ferritin level in women with preeclampsia was 92.25 ± 14.81, which turned out to be significantly higher than healthy pregnant women. The mean ferritin level in women with gestational diabetes mellitus was 33.28 ± 8.38, but the mean of pregnant women with diabetes mellitus was not significantly different from healthy subjects. The mean ferritin level in women with oligohydramnios was 46 ± 10.29, but. The mean ferritin level in women with placental abruption was 35.5 ± 9.19, but it was not significantly different from healthy subjects. The mean ferritin level in women with fetal abnormality was 31 ± 6.42; it was not significantly different from healthy subjects. The mean ferritin level in women with premature rupture of the membrane was 88.90 ± 15.32, which turned out to be significantly different from the control group. In general, the results of this study showed that the mean ferritin level in

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women with preeclampsia and premature rupture of membrane was significantly higher than healthy women without complications of pregnancy; however, ferritin in the other complications of pregnancy, including Gestational diabetes, fetal abnormalities, placental abruption, and oligohydramnios were not statistically different with healthy pregnant women [3-6].

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