The effect of reproductive health counseling on readiness of managing menarche

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ABSTRACT

The lack of knowledge of reproduction health contributed to the readiness toward coping menarche. It is believed that reproductive health counselling could improve the adolescents’ readiness of coping menarche. This study aimed to determine the effect of the reproductive health counseling on the adolescents’ readiness in coping menarche. This study used a quasi experimental method with non-equivalent control group. Sample of the study was 34 in the control group, and 34 in the experiment group recruited by using convenience sampling. Independent sample t-test showed that there was an effect of reproduction health counseling on the readiness in coping menarche among female students of Junior High School (p-value <0.01).

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1. Introduction

Adolescence is a period when a person is in a transition state between children and adults. The changes that occur in adolescence are physical changes and non-physical changes. Adolescence is the most critical period in comparison with other life developments because at this time there are changes in both physical and psychological dimension (Hashmi, 2013). Data of World Health Organization (WHO), in 2014, about 1/5 of the world population was adolescents aged 10-19 years, and about 900 million were living in low and middle income countries. Results of Indonesia Demographic and Health Survey for Adolescents on reproductive health in 2012 showed that female adolescents who did not know about physical changes were 43.3% higher than result of SDKI-R in 2007 equal to 30.7% (Indonesian Ministry of Health, 2013).

It is considered as taboo when people talk about the problem of menstruation in the family in some societies, which lead to lack of knowledge about the physical and psychological changes associated with menarche among adolescents (Pandey, 2014).

Preliminary study among 109 female students, 68 of them had not got menstruation yet. Within those who had not experienced first menstruation 87% stated that they did not know about the first menstruation. Majority of the students said that they were anxious and afraid of menarche because of lack of information or knowledge about menarche. When they have better knowledge and understanding about menarche they would probably have better readiness in facing menarche (Rabiepoor, Valizadeh, and Barjasteh, 2017).

In response to that issues, the school made a program interventions including the Bantul I Primary Health Center to promote sexual and reproductive health. However, from the interviews of teachers and some students, they stated that there had never been any detail explanation of reproduction health care particularly in facing menarche. The program had only focused on health...
examination of students and the School Health Unit service. The objective of this study was to investigate the effect of reproductive health counseling on the readiness in facing menarche of students of Junior High School.

2. Method

This study was a quasi experimental study by using non-equivalent control group. The experimental group was given intervention in the form of counseling and leaflets while the control group was only given leaflets.

The population in this study were all students of grade VII at a Junior High School in Bantul Regency that had not experienced menstruation. Samples were recruited by using convenience sampling technique and they were divided into two groups i.e. 34 in the control groups and 34 in the experimental groups through the serial number sequence number. The odd numbers were included in the control group and even numbers were included in the experimental group. Secondary data were from total number of female students in a Junior High School, and primary data were obtained from the questionnaire answered by female students in that same school. The data were analyzed by using paired t-test technique and independent t-test. Before data collection, this study gained approval from Ethical Review Board of Aisyiyah University of Yogyakarta.

3. Result

Use Bivariate analysis so that it can generate data as below. Table 1 shows the average readiness of facing menarche before and after the intervention. The mean of pretest was 65.66 and the mean of posttest was 79.90. It can be concluded that there was an increase by 14.24 on the average readiness of facing menarche before and after giving the counseling of reproductive health. The summary of statistic test is as follows.

Table 1. The average readiness of facing menarche before and after the intervention on the experimental group

<table>
<thead>
<tr>
<th>Pair</th>
<th>Mean</th>
<th>n</th>
<th>Std. Deviation</th>
<th>Std. Error Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Post test</td>
<td>79.9068</td>
<td>34</td>
<td>3.92126</td>
<td>0.67249</td>
</tr>
<tr>
<td>Pre test</td>
<td>65.6606</td>
<td>34</td>
<td>6.19491</td>
<td>1.06242</td>
</tr>
</tbody>
</table>

Source: Primary Data, 2016

Table 2 shows the result of statistical test by using paired sample t-test on the experimental group.

Table 2. The hypothesis result by using paired sample t-test on the experimental group

<table>
<thead>
<tr>
<th>Paired Differences</th>
<th>95% Confidence Interval of the Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
</tr>
<tr>
<td>Pair 1 Post-Pre</td>
<td>14.2462</td>
</tr>
</tbody>
</table>

Source: Primary Data, 2016

Table 3 shows of the average readiness of facing menarche before and after the intervention on the control group.

Table 3. The average readiness of facing menarche before and after the intervention on the control group

<table>
<thead>
<tr>
<th>Pair</th>
<th>Mean</th>
<th>N</th>
<th>Std. Deviation</th>
<th>Std Error Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>Post test</td>
<td>71.056</td>
<td>34</td>
<td>4.2339</td>
<td>0.7262</td>
</tr>
<tr>
<td>Pre test</td>
<td>69.802</td>
<td>34</td>
<td>4.7009</td>
<td>0.8061</td>
</tr>
</tbody>
</table>

Source: Primary Data, 2016

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The mean of pretest was 69.80 and the mean of posttest was 71.05. It can be concluded that there was an increase by 1.25 on the average readiness of facing menarche before and after giving the intervention. The summary of statistic test is as follows.

Table 4 shows the result of statistical test by using paired sample t-test on the control group.

### Table 4. The hypothesis result by using paired sample t-test on the control group

<table>
<thead>
<tr>
<th>Paired Differences</th>
<th>95% Confidence Interval of the Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mean</td>
<td>Std. Deviation</td>
</tr>
<tr>
<td>Pair 1 Post-Pre</td>
<td>1.2538</td>
</tr>
</tbody>
</table>

Source: Primary Data, 2016

Table 5 shows the average readiness of facing menarche with counseling. The hypothesis test was used to investigate the mean between the experimental group and the control group by using independent t-test.

### Table 5. The average readiness of facing menarche with counseling

<table>
<thead>
<tr>
<th>Readiness Menarche</th>
<th>N</th>
<th>Mean</th>
<th>Std. Deviation</th>
<th>Std. Error Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>With Counseling</td>
<td>34</td>
<td>79.907</td>
<td>3.9213</td>
<td>0.6725</td>
</tr>
<tr>
<td>Without counseling</td>
<td>34</td>
<td>71.065</td>
<td>4.2339</td>
<td>0.7261</td>
</tr>
</tbody>
</table>

Source: Primary Data, 2016

The average readiness of facing menarche with counseling was 79.90, and without counseling was 71.05. It can be concluded that there was difference by 8.85 on the average readiness of facing menarche between experimental and control group. The summary of statistic test is as follows.

Table 6 shows the result of independent t-test on experimental group and control group of independent sample test.

### Table 6. The result of Independent t-test on experimental group and control group of Independent Sample Test

<table>
<thead>
<tr>
<th>Readiness Menarche</th>
<th>95% Confidence Interval of the Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>F</td>
<td>Sig.</td>
</tr>
<tr>
<td>Equal variances assumed</td>
<td>0.134</td>
</tr>
<tr>
<td>Equal variances bot assumed</td>
<td>8.943</td>
</tr>
</tbody>
</table>

Source: Primary Data, 2016

Based on table 6 it can be concluded that there is a significant statistically differences on scores of readiness of facing menarche between experiment and control group (t: 8.943; p< 0.01).

### 4. Discussion

The result showed that there was an increase on the readiness of facing menarche after the intervention. Literature stated that health education or counseling is an intervention that could improve people’s behavior and attitude (Alexander et al., 2012). The result of this study also revealed that the experiment group had significant changes on readiness of facing menarche than the control group. It means that the intervention could successfully improve the readiness of the students to face menarche. It is in line with previous study that health education was an information media

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needed by adolescents to understand the changes occurred on menarche (Nemade, Anjenaya, and Gujar, 2009).

Evidence shows that health counseling could influence behavior and attitude of people, and could help healthcare providers in their health programme intervention which aim to promote healthy lifestyle (Guez and Allen, 2012). This study result is also similar with previous study that adolescents who gained information about menstruation had better understanding on menstruation cycle (Care, 2016). Adolescents also stated that they needed more information related to menstruation since they only get information related to menstruation from their mothers (Sommer et al., 2016). Other research revealed that reproductive health education and information are required to be available for adolescents in a programme intervention which aim to improve their knowledge related to reproductive health (Phillips-Howard et al., 2015). Additionally, it suggested that the health education and counseling provided at school could contribute on the students’ psychological response in facing menarche (Sommer et al., 2016).

It is believed that health education provided by school could be one of effective strategy to improve readiness of female adolescents to face menarche. The school is an institution established where generally adolescents spend their time gain knowledge, improve their personal academic, life skill and ability as well as building their personality and character for their future life. Therefore, health education conducted at school would probably has more impact than those which conducted outside school. Evidence shows that health education conducted in school including peer group had significant impact on changing behaviour and perception of adolescents (Salam, 2016). Behavior and attitude changes can be influenced by providing information such as counseling. Counseling is one of methods that has great effect when conducted appropriately because counseling mainly aim to provide support for client to empower them in making decision based on their own choice (Widiastuti, 2009).

5. Conclusion

Health education can be considered as one of strategy to increase readiness of female adolescents in facing menarche. Therefore, health education conducted at school could be an alternative method when people would like to educate adolescents regarding to menstruation matters. Future research including larger sample size is needed in regards issues related to menarche among adolescent in order to provide comprehensive evidence which could influence adolescents’ sexual and reproductive public policy.

References


