

**Perceived Problems and Prospects on Acceptability of  
Industrial Waste Sludge As An Alternative  
Component for Bricks Making**

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the Faculty of the Graduate School  
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**ABSTRACT**

**Title : Perceived Problems and Prospects on Acceptability of Industrial Waste Sludge As An Alternative Component for Bricks Making**

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This study is conducted to identify the profile of the respondents as regards the age, number of years in business, position, and highest educational attainment. The problems are perceived as to be encountered by the respondents as regards the mechanical properties, physical properties, and thermal properties; the significant differences in the perceived problems by the respondents when they are grouped according to the profile variables; the prospects which are perceived by the respondents in the acceptability of bricks using industrial waste sludge as an alternative component for house construction, pathways, fences, and smelter; and the correlation between the perceived problems and perceived prospects in the acceptability of bricks using industrial waste sludge as an alternative component.

## **Conclusions**

The findings in this study, revealed that majority of the respondents owned and managed brick manufacturing companies for six to 15 years. Most of them are individuals who are between 30 and 40 years of age and are college graduates.

The respondents believe that in producing such alternative product, there will be no problem in terms of mechanical, physical, and thermal properties. Based on their opinions, the brick is durable and of high quality, the mixture is workable, the color shading is satisfactory, and it can endure extreme heat.

There is no difference in the perceptions of the respondents in terms of the problems mentioned even if, they are grouped according to age, number of years in business, position and highest educational attainment.

In general, the brick is acceptable when used in house construction, fences, path walks and smelter as reflected in the evaluation of the owners and managers of bricks manufacturing companies. These bricks can be alternative construction materials equally the same as the one existing in the market in terms of quality, strength, durability and workability.

Based on the Pearson-r result, the perceived problems in making this type of bricks and its acceptability have no association or correlation, meaning; regardless of the problems that the manufacturer might

encounter in producing such product, its acceptability or suitability when used as an alternative construction material will not be affected.

Therefore; using industrial waste sludge as an alternative component bricks are feasible material for house construction, fences, path walks and smelter.

### **Recommendations:**

Considering the above conclusions derived from the findings, the researcher recommends the following measures:

1. Presentation of the study in various product exposition, seminars and conferences to introduce the brick for commercial production.
2. Presentation of the study to various government agencies such as Department of Science and Technology, Department of Trade and Industry, Department of Environment and Natural Resources and other government agencies to encourage further research considerations.
3. Systematize production of the brick must be studied and initiated to know the production costs.
4. Laboratory tests should be conducted if the bricks will be produced commercially.

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