

**APPLICATIONS OF EXPENDABLE MOULD
AND PATTERN CASTING TECHNIQUES**

by :

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THIS PROJECT IS
DEDICATED TO MY
PARENTS FOR HELPING
ME THROUGH MY STUDIES.

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SUMMARY

The purpose of this project is to demonstrate the applications of expendable mould and pattern casting techniques.

In order to achieve the purpose of this project, materials had been bought and properly used.

First of all, two pieces of aluminium had been bought and each one had been grinded at one side. Facing these two sides together, four screws had been screwed on the two pieces of aluminium in order to have one workpiece.

After that the workpiece had been fixed on a lathe and the drilling and machining of the expendable mould had been done.

The next step was the production of the expendable patterns. In this case, wax was used, which had been melted and poured in the mould to have the patterns. After the patterns had been produced, they had been joined together to form the pattern assembly above which gypsum had been poured in order to have the mould for the investment casting ready.

After temperature firing and pattern elimination the cavity (mould) was ready and melt metal had been poured into it to produce the finished metal component.

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