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# 冲压件复合模设计及凸凹模加工工艺设计

## 摘 要

通过从书本和课堂中所学的知识,并且对该制件的工艺进行详细的分析,设计出的一套落料冲孔复合模的模具方案,这套模具主要是为了完成心形冲裁件的生产而设计出的一套模具,本篇论文主要论述了心形冲裁件模具的总体结构的设计、冲裁工艺的计算与设计、心形冲裁件模具中主要零部件的选用和设计,通过使用此模具生产加工该心形冲裁件在生产效率这方面得到了大大的提高,同时降低了生产成本。之后通过所学知识的研究,对冲裁过程中所使用主要零部件凸凹模的机械加工工艺进行了简单的分析。此外,如今模具的适用范围越来越大,其需求量也越来越多,因此根据此模具的设计,可以更加熟悉冲压模具。

**关键词:** 冲裁; 复合模结构; 工艺分析

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## Abstract

Through the knowledge learned from books and classroom, and the detailed analysis of the process of the part, a set of blanking and punching compound die scheme is designed, the calculation and design of the blanking process, the selection and design of the main parts of the die. Through the use of the die, the production process of the die is improved. The production efficiency of the core-shaped blanking part has been greatly improved, and the production cost has been reduced at the same time. After that, through the study of the knowledge, the machining technology of the punch and die of the main parts used in the process of blanking is simply analyzed. In addition, the scope of application of the die is more and more, and its demand is more and more, so according to the design of the die, we can be more familiar with the stamping die.

**Key words** Stamping Compound mode structure Process analysis

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