Deteksi *Over Dimension* dan *Overload* Pada Truk Menggunakan Metode
YOLO* dan *Tiny-YOLO (*Over Dimension and Overload Detection*
on Trucks Using the YOLO and Tiny-YOLO Methods)
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ABSTRACT

ODOL (Over Dimensions and Overload) trucks are a serious problem because they are one of the factors causing road damage and one of the factors causing traffic accidents. The government has followed up this matter by monitoring by police officers and the transportation service. This method has weaknesses, each person's visuals and concentration are different, causing inconsistencies and heterogeneity of perception.. Therefore, the researcher designed an Over Dimension vehicle detection application using the YOLO and Tiny-YOLO methods. This application is divided into 3 processes. First, detecting truck-type vehicles using Tiny-Yolo (a compressed version of Yolo). Second, segmenting the head and body of the truck using Yolo. Third, detecting Over Dimension on trucks. The analysis was carried out using three different testing devices. As a result, Tiny-Yolo was able to detect trucks with more than 95% accuracy. The head and body segmentation using Yolo got 97.44% highest accuracy. Over Dimension and Overload classification using LVQ got 88.44% training accuracy and 79.48% testing accuracy.

Key words: *YOLO, Over Dimension and Overload, Truck Detection, Tiny-YOLO*