

## ***Abstrak***

*Diafragma adalah elemen struktur yang berfungsi untuk mendistribusi gaya gempa ke elemen vertikal seperti kolom atau dinding geser. Terdapat tiga klasifikasi fleksibilitas diafragma, yaitu diafragma fleksibel, diafragma semi-kaku, dan diafragma kaku. Diafragma semi-kaku mensimulasikan perilaku kekakuan sejajar bidang diafragma yang sesungguhnya. Fleksibilitas pada diafragma semi-kaku dapat memengaruhi distribusi horizontal gaya gempa ke elemen vertikal. Selain itu, distribusi horizontal gaya gempa juga dipengaruhi oleh koreksi torsi. Terdapat beberapa metode koreksi torsi yang tepat pada diafragma semi-kaku, antara lain metode eksentrisitas statik, metode momen torsi, dan metode koreksi torsi dengan penambahan momen kopel.*

***Kata kunci:*** *fleksibilitas diafragma, distribusi horizontal gaya gempa, pusat kekakuan, eksentrisitas, koreksi torsi diafragma semi-kaku*

### ***Abstract***

*Diaphragms are structural elements that serve to distribute seismic forces to vertical elements such as column or shear walls. There are three flexibility classifications of diaphragm, such as flexible diaphragms, semi-rigid diaphragms, and rigid diaphragms. Semi-rigid diaphragm simulates the real behavior of in plane stiffness at diaphragm. Flexibility in semi-rigid diaphragm can affect the horizontal distribution of earthquake forces to vertical structural elements. In addition, horizontal distribution of seismic forces are also affected by torsional correction. There are several correct torsional correction methods in semi-rigid diaphragm, such as static eccentricity method, torsional moment method, and torsional correction method with addition of the coupling moment.*

**Keywords:** *diaphragm flexibility, horizontal distribution of earthquake forces, center of rigidity, eccentricity, torsional correction in semi-rigid diaphragm*