**Introduction**: To analyze the relationship between Angptl 2 level and coronary lesions heart disease.

**Methods**: A total of 262 Han Hohhot residents who underwent coronary angiography in our hospital from January to November, 2016, were collected. According to the results of coronary angiography, the patients were divided into four groups according to the coronary angiography results: the normal group (N), the single lesion group (S), the double-lesion group (D), and the three-lesion group (T). According to the Gensini score of each coronary lesion, the patients with coronary heart disease of groups S, D and T, were divided into three groups: the mild-stenosis group (MI, < 30 points), the moderate-stenosis group (MO, 30-90 points), and the severe-stenosis group (SE, > 90 points). The fasting elbow venous blood was collected in the hospital after 12-hr fasting for detecting the level of Angptl 2 was tested within 12 hours in fasting state by ELISA. The clinical data Angptl 2, as well as some inflammation factors, were compared among different groups to find the relationship with and coronary angiography results.

**Result**: Compared with group N, the serum level of Angptl 2 in the patients group T was highest, followed by group D and S with coronary heart disease was significantly higher (p<0.05). As the number of coronary lesions increased, the level of Angptl 2 also increased, which was positively correlated with the degree of coronary stenosis. As with the increase of Gensini score increased, the Angptl 2 level also increased, indicating that the Gensini score increased as the number and extent of coronary lesions.

**Conclusion**: The level of Angptl 2 can reflect the extent of coronary lesions and can be used as a clinical indicator for the detection of coronary lesions.