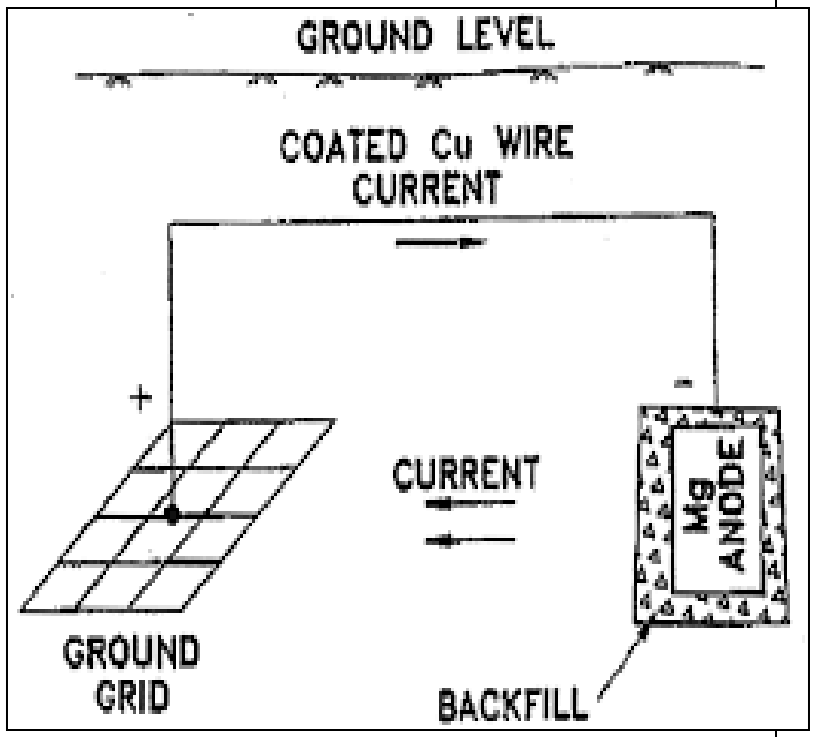
IMPRESSED CURRENT CATHODIC PROTECTION METHOD

PRINCIPLE

An impressed current is applied in the opposite direction of the corrosion current to nullify it & corroding metal is converted from anode to cathode.



Construction

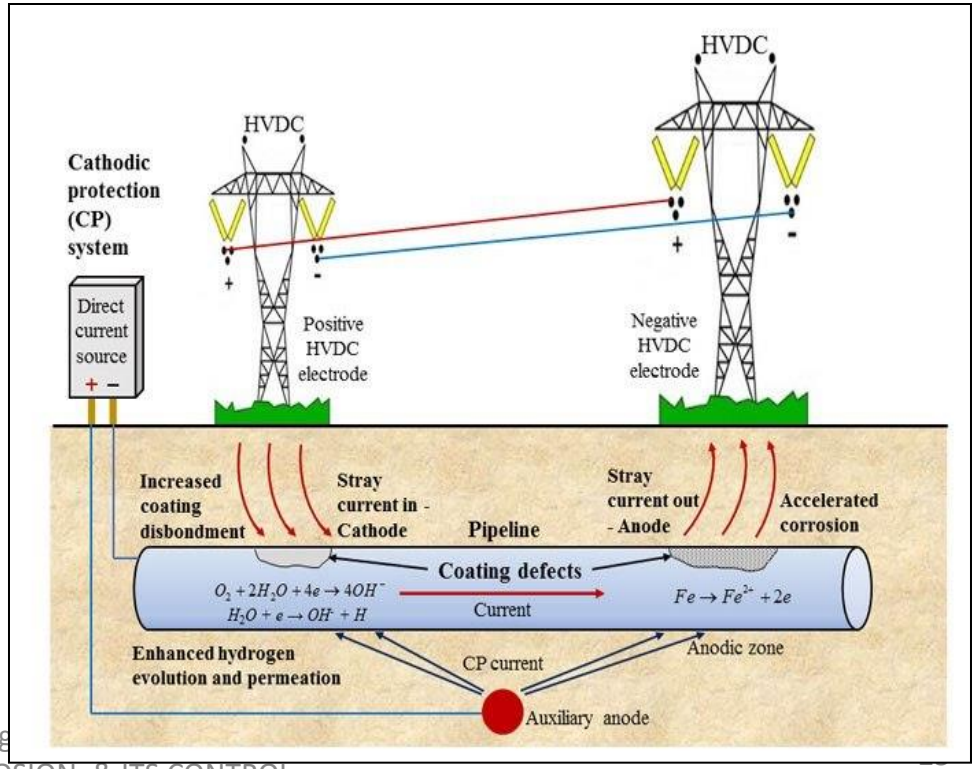
- -Ve terminal : object to be protected
- +Ve terminal : an inert anode.
- Inert anode: graphite or platinized Ti
- **The anode is buried in a back fill**
- (Back fill: a mixture of gypsum, coke, breeze and sodium sulphate).

WORKING

- The back fill provides good electrical contact to anode.

The current from the battery is impressed on the metallic structure to be protected which acts as the cathode.

Applications



Advantages of impressed current protection method

- Larger driving voltage.
- Larger flexibility control.
- It is applicable to large objects.
- Uncoated parts can also be protected.

Limitations of impressed current protection method

1.Maintenance and installation cost are very high.