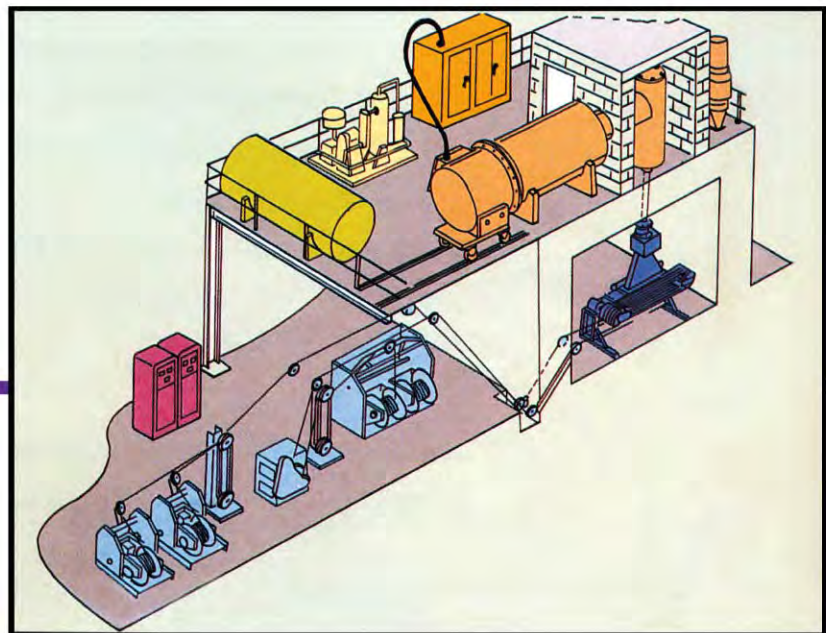


電子束照射過程

PE電線常用的交連方法有兩種，一為化學交連法，一為電子束交連法。而PVC電線之交連方法則以電子束照射交連法最適合。在化學交連過程中，將有機過氧化物之PE材料經押出機押出，披覆在導體上然後進入連續加硫機，在高壓蒸汽管中經過一段時間，來完成交連反應。此種方法對導體小於18AWG厚度小於20mils者，皆不適合。而在電子照射交連過程中，電線直接由給線架精確且均一地經由高能電子束掃描器照射，不論導體直徑或大或小，皆可加工成交連的照射PVC及PE電線。



The Radiation Process

There are two methods of curing cross-linked PE, chemical cross-linking and radiation cross-linking, but only radiation process can be applied to PVC. In chemical process, PE compound mixed with peroxide is extruded, and directly passed through a continuous vulcanization facility for a certain period to make contact with high pressure steam, but it is not practical for conductor sizes smaller than 18AWG or insulation wall thickness less than 20 mils. In radiation cross-linking process the wire from pay-off stand uniformly and accurately passes through a scanner where high energy electron beams are ejected from a power source. In this way, both small and large size wires with irradiated cross-linking PVC or PE can be processed.