12-8. Sub Hopper Toner Empty Detecting Mechanism/Control

- A toner-empty condition of the Sub Hopper is detected by the magnet fitted to the Sub Hopper Toner Empty Detecting Lever and Sub Hopper Toner Empty Switch S106.
- The S106 ON signal is used to energize Main Hopper Toner Replenishing Motor M8.

<Mechanism>

- The Sub Hopper Toner Empty Detecting Lever rides over the eccentric cam installed at the rear end of the Sub Hopper Toner Mixing Lever. When drive from M9 is transmitted to the Sub Hopper Toner Mixing Lever, the Toner Empty Detecting Lever is moved up and down.
  - When the amount of toner in the Sub Hopper remains more than the predetermined level:
    Since the Toner Empty Detecting Lever is on the Toner, it does not make an up-and-down motion, keeping S106 deactuated. Hence, the copier does not determine that toner is empty.
  - When the amount of toner in the Sub Hopper is less than the predetermined level:
    The Toner Empty Detecting Lever is moved up and down by the eccentric cam, which repeatedly actuates and deactuates S106. When S106 is turned on continuously more than 10 times, the copier determines that toner is empty in the Sub Hopper.

