

Model Railway

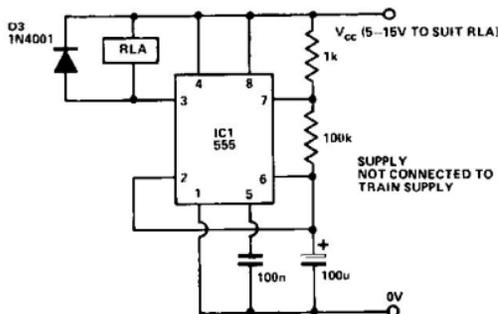
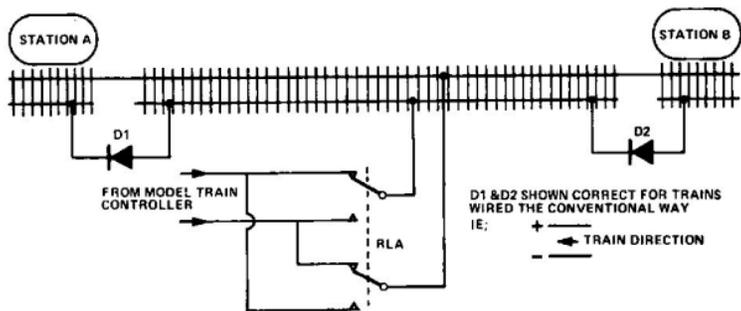
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This simple circuit provides an interesting little branch line service for a model railway. A small country railbus starts at a station, stops, then returns to the first station again, the cycle repeating indefinitely.

The track is arranged to have two isolated station sections at each end. The power is fed to the centre long section via a changeover relay, RLA. Diodes D1 and D2 feed the station sections and ensure that a train in station A can only move towards station B and vice versa. The diode connections are correct for conventionally wired trains.

RLA is under control of a 555 timer. This is connected as an oscillator with almost equal mark/space ratio. The period is longer than the time taken for the train to travel from one station to the other. When the train reaches the station, as the diode will be reverse biased, it will stop. When, however, the relay changes over the diode will conduct, and the train can return to the first station.

The half period of the oscillator should be made equal to the journey time plus the stop required at the station. The values shown give about 12



seconds which should be sufficient for most layouts.

The stop/start is unramped, but this is

not particularly noticeable at the speed all self respecting branch line trains travel.