**A: Ectopic expression with natural promoter**

- Target gene: HRS2
- CDS: F
- Marker: Promoter + coding sequence + terminator

**B: Ectopic expression with artificial promoter**

- Target gene: PgpdA
- CDS: F
- Marker: PgpdA coding sequence + terminator

**C: Targeted gene replacement**

- Target gene: HRS2
- Marker: HRS2

**D: In locus overexpression (promoter exchange)**

- Target gene: PgpdA
- Marker: PgpdA