

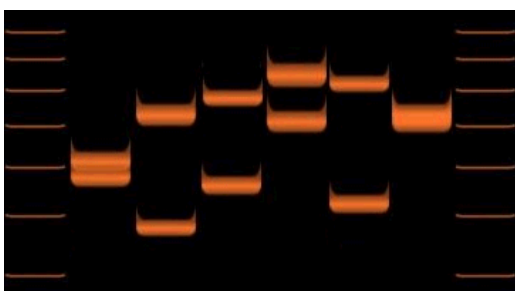


The minisatellite marker D1S80 is located at 1p35-p36. This VNTR is 16 bases long. With a variation of alleles between 3-24 repeats, the locus displays enough diversity to aid in distinguishing between people. Although this is not a CoDIS marker, use of multiple loci are required to definitively identify samples. The large repeat (16bp) permits the use of standard agarose gel electrophoresis to explore the diversity of this locus in our lab. PCR products range between 430 to 814bp long.

- D1S80-for: 5'-GAAACTGGCCTCCAAACACTGCCCCGCCG-3'
- D1S80-rev: 5'-GTCTTGTTGGAGATGCACGTGCCCTTGC-3'

1. PCR the DNA [samples extracted from cheek cells](#) using the PCR Beads
2. Pour 2% agarose into casting apparatus in refrigerator
 - 2 gels per class need to be made → 100ml of TBE with 2g agarose
 - add 5µl SYBR safe solution into the molten agarose before casting
 - place 2 sets of combs into the gel → at one end and in the middle
3. load gel with DNA ladder
 - Sample is from the PCR
4. Run gel at 120V for 20 minutes
5. Visualize on UV transilluminator

Example Results



1. How many alleles are visible in each lane?
2. Are the genotypes distinguishable between individuals?
3. Are any of the alleles common between individual samples?