



# Polymerase Chain Reaction

An Introduction to the Basics of PCR for the Testing Lab Analyst

## Understand

- Basic theory of Nucleic Acids
- Basic theory of PCR
- Types of PCR and their application, including:

1. DNA as a template
2. RNA as a template
3. end point PCR
4. real-time PCR, and
5. digital PCR

- The components of a PCR reaction
- Optimising a PCR, aka '101 ways to do PCR'.
- Trouble shooting PCR results
- PCR in the testing lab, including:

1. the testing environment
2. sample receipt, handling and preparation,
3. reaction set-up,
4. reaction disposal,
5. data analysis.

## Presenter

This course is presented by Dr Ellen Podivinsky.

Ellen has worked as a IANZ technical assessor and has contributed extensively in the teaching and application of PCR.