

GENERIC CHALLENGE PROTOCOL (single food)

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CHALLENGE SUBSTANCE

To provide a high PPV and NPV for food challenges, it is estimated that the cumulative total dose of food protein should be approximately 4g with a final dose of around 2-3g. For many foods this will equate to a total cumulative dose of 8 grams of dried food- however this will vary depending upon the protein concentration of the food. For meat and fish the challenge dose may need to be increased to approximate a typical serving size.

The following table outlines the challenge protocol in **weight of food protein, NOT TOTAL WEIGHT**. Foods should be weighed out for the challenge and the approximate proportion of the total weight of the food which is made up of protein must be known (approximately) to calculate the total weight for challenge.

Dose schedule	Weight food protein	Total weight of challenge food (mg)
1st	10mg	10mg x 100/known % protein of food*
2nd	30mg	30mg x 100/known % protein of food
3rd	100mg	100mg x 100/known % protein of food
4th	300mg	300mg x 100/known % protein of food
5th	1000mg	1000mg x 100/known % protein of food
final	3000mg	3000mg x 100/known % protein of food

e.g. A food with 20% protein would have a first dose of 50mg of food (10x100/20), a second dose of 150 (30x 100/20).

CHALLENGE PROTOCOL - Day 1

Time	Food protein (mg)
0	Smear inside lip (not to touch outside lip)
20 min	10mg
40 min	30mg
60 min	100mg
80 min	300mg
100 min	1000mg (1g)
120 min	3000mg (3g)
Cumulative total	4.44g

OBSERVATION POST-CHALLENGE: Generally for 1-2 hours

HOME CONTINUATION

Days 2-7: final cumulate dose daily

After Day 7: Challenge food should be continued in diet at least weekly following a successful challenge at normal serving size.

ASCIA Food Allergen Challenge Protocols have been developed to standardise protocols used by clinical immunology and allergy specialists in Australia and New Zealand. However, ASCIA takes no responsibility for any adverse outcomes that may occur using these protocols. It is important to note that food challenges:

- Are primarily used to determine if positive food allergy tests are associated with current clinical allergy.
- Should only be undertaken for patients who have been carefully selected by clinical immunology and allergy specialists or appropriately qualified and experienced medical practitioners in consultation with clinical immunology and allergy specialists.
- May provoke an allergic reaction in sensitised individuals and should therefore only be performed under medical supervision with immediate access to emergency treatment for anaphylaxis.

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