

5.1 Evaluation Plan

Evaluation of *Fun not Fuss with Food* is extremely important in order to measure the effectiveness of the workshop and to incorporate quality reflection and continual improvement.

This section provides five standard evaluation tools to:

- facilitate and promote participant feedback
- gauge participant satisfaction with the workshop
- identify if the target group has been reached
- identify whether objectives are achieved

An optional evaluation tool — the Children’s Eating Behaviour Mealtime Inventory (CEBI) is included for measuring changes in children’s eating and mealtime behaviours. Further information on this tool is provided in Section 5.3.

Overview of evaluation tools

An overview of the evaluation tools is provided below. All evaluation tools are provided as master copies in Section 7.0 and are available electronically on the *Fun not Fuss with Food* Facilitator’s Manual CD.

Time	Evaluation tools	Explanation/ further notes
Pre-workshop	Attendance Form	<ul style="list-style-type: none"> • Records details of all participants
	Pre-workshop Questionnaire	<ul style="list-style-type: none"> • Identifies participant’s problem, concern and confidence regarding their child’s behaviour • Assesses knowledge on nutrition and behaviour management strategies
	CEBI – Children’s Eating Behaviour Mealtime Inventory (Optional)	<ul style="list-style-type: none"> • Measures children’s eating and meal-time behaviours
Post-workshop	Post-workshop Questionnaire	<ul style="list-style-type: none"> • Re-assesses participant’s concern and confidence regarding their child’s behaviour • Re-assesses knowledge on nutrition and behaviour management strategies • Identifies participant’s intention to trial new strategies
	Participant Feedback Form	<ul style="list-style-type: none"> • Gathers feedback from participants about the workshop
	Facilitator Record/ Reflections Form	<ul style="list-style-type: none"> • Documents facilitator processes regarding delivery of the workshop
One-month post workshop	CEBI (Optional)	<ul style="list-style-type: none"> • Mail-out repeat CEBI survey

Socio-demographic descriptions (e.g. income, number of children in family, marital status, country of birth, language spoken at home, etc.) of the participants have not been included in the evaluation tools. However, the Pre-workshop Questionnaire can be altered to include questions regarding participants' socio-demographic characteristics. Other areas of interest to measure may be maternal depression, children's behaviour, attitudes about parenting etc.

However, the standard evaluation tools will more than adequately provide information on process and impact evaluation. The CEBI tool provides some measurement of outcome evaluation.

Overview of evaluation measures

Process evaluation focuses on the strategies and what was covered in the *Fun not Fuss with Food* workshop.

Impact evaluation focuses on the immediate effects of the *Fun not Fuss with Food* workshop. That is, did the *Fun not Fuss with Food* workshop achieve its objective to increase capacity of parents to manage children's problem eating and mealtime behaviours?

Outcome evaluation focuses on subsequent or longer term effects or changes. That is, did the *Fun not Fuss with Food* workshop achieve its aim to improve problem eating and mealtime behaviour of children aged 2 – 10 years?

An evaluation plan for the *Fun not Fuss with Food* workshop is provided on the following page. This corresponds with the table below which provides an overview of how the aims, objectives and strategies relate to evaluation measures.

Components	Measured via	Type of Evaluation	Evaluation Tool
Aim – the overall purpose or what ultimately is to be achieved	→	Outcome Evaluation	<ul style="list-style-type: none"> • CEBI
Objectives – changes expected in the target group to contribute to the aim	→	Impact Evaluation	<ul style="list-style-type: none"> • Pre-workshop Questionnaire • Post-workshop Questionnaire
Strategies – what is done to achieve the objectives	→	Process Evaluation	<ul style="list-style-type: none"> • Attendance Form • Participant Evaluation Form • Facilitator Evaluation Form

Fun not Fuss with Food Workshop Evaluation Plan

Aim – To improve problem eating and mealtime behaviours of children aged 2 – 10 years				
Objectives – To increase the capacity of parents to manage children’s problem eating and mealtime behaviours				
Sub-Objectives	Strategies	Key Performance Indicators	Evaluation Tools	Target
1. To increase access by parents to information and resources for managing children’s problem eating and mealtime behaviours	<ul style="list-style-type: none"> Market and promote <i>Fun not Fuss with Food</i> workshops Provide workshops at accessible venue and times for parents 	<ul style="list-style-type: none"> Number of participants attending workshop Number of participants rating overall workshop as good or excellent 	<ul style="list-style-type: none"> Attendance Form Participant Feedback Form 	<ul style="list-style-type: none"> 70% rating workshop as good or excellent
2. To increase parents knowledge of the key nutrition messages from the <i>Fun not Fuss with Food</i> workshop	<ul style="list-style-type: none"> Facilitator to present Nutrition Section of the workshop Participant to record their child’s nutritional requirements Participant to describe two strategies to promote healthy foods in their child’s diet 	<ul style="list-style-type: none"> Increased knowledge of key nutrition messages 	<ul style="list-style-type: none"> Pre-workshop Questionnaire Post-workshop Questionnaire 	<ul style="list-style-type: none"> 70% reporting correct serves from Five Food Groups post-workshop
3. To increase parents knowledge of the key behaviour management strategies from the <i>Fun not Fuss with Food</i> workshop	<ul style="list-style-type: none"> Facilitator to present Managing Behaviours Section of the workshop Participant to describe their child’s problem eating and mealtime behaviours Participant to identify the origins of their child’s problem and mealtime 	<ul style="list-style-type: none"> Increased knowledge of key behaviour management strategies 	<ul style="list-style-type: none"> Pre-workshop Questionnaire Post-workshop Questionnaire 	<ul style="list-style-type: none"> 70% reporting appropriate behaviour management strategies post-workshop

Aim – To improve problem eating and mealtime behaviours of children aged 2 – 10 years				
Objectives – To increase the capacity of parents to manage children’s problem eating and mealtime behaviours				
Sub-Objectives	Strategies	Key Performance Indicators	Evaluation Tools	Target
	behaviours <ul style="list-style-type: none"> Participant to describe two behaviour management strategies for their child’s problem and mealtime behaviours 			
4. To decrease parents concern about their child’s problem eating and mealtime behaviour	<ul style="list-style-type: none"> Facilitator to initiate group discussion on common concerns, parent-child feeding relationship and tips for child-friendly meals 	<ul style="list-style-type: none"> Number of participants reporting decreased concern about their child’s nutritional intake 	<ul style="list-style-type: none"> Pre-workshop Questionnaire Post-workshop Questionnaire 	<ul style="list-style-type: none"> 70% reporting decreased concern from pre- to post-workshop
5. To increase parents confidence in managing their child’s problem eating and mealtime behaviour	<ul style="list-style-type: none"> Facilitator to initiate group discussion on common behaviours and parental responses Participant to review take home messages 	<ul style="list-style-type: none"> Number of participants reporting increased confidence in managing child’s problem eating and mealtime behaviour 	<ul style="list-style-type: none"> Pre-workshop Questionnaire Post-workshop Questionnaire 	<ul style="list-style-type: none"> 70% reporting improved confidence from pre- to post-workshop
6. To encourage parents to trial new behaviour management strategies	<ul style="list-style-type: none"> Participant to identify strategies to trial at home Facilitator to present Conclusion/Community Resources Section of the workshop Participant to identify if they require further professional assistance 	<ul style="list-style-type: none"> Number of participants reporting intention to trial new strategies 	<ul style="list-style-type: none"> Post-workshop 	<ul style="list-style-type: none"> 70% intending to trial at least one new strategy

5.2 Instructions for evaluation

Explaining the purpose of evaluation to participants

At the *Fun not Fuss with Food* workshop (and other times), explain to participants that Queensland Health is evaluating the effectiveness of the *Fun not Fuss with Food* program. This means we need to collect information about the participants, but the information will be collected anonymously. The participant's name will not be attached to the questionnaires.

The information will be used for evaluation purposes only and is strictly confidential. Summaries of group information (eg "70% of all participants reported decreased concerns") may be published but no information on individuals will be released.

Emphasise to the participants that by completing the questionnaires they are making an important contribution to the evaluation and to the future of the *Fun not Fuss with Food* program.

Check that the participants are able to read the questions and know how to complete the questionnaires eg. by ticking the box they think best describes their child's behaviour etc.

If participants are attending on behalf of more than one child, please request that they complete separate Pre-workshop and Post-workshop questionnaires for each child concerned.

Printing the evaluation tools

All evaluation tools are provided as master copies in Section 7.0 and are also available electronically on the *Fun not Fuss with Food* Facilitator's Manual CD.

To print off the evaluation tools from the CD, open the evaluation folder and select evaluation tools individually. Print off evaluation tools as required. Print **single-sided** on coloured paper (double-sided may result in participants missing questions).

For the Pre-workshop Questionnaire and Post-workshop Questionnaire ask participants to place the same four-digit ID number at the top right hand corner of each page (eg. number of the child's birthday in two digits, followed by the number of their birthday in two digits). This is so that the data collected at different times from the same participant can be connected to assess changes in concern and confidence pre- to post-workshop.

5.3 Children’s Eating and Mealtime Behaviour Inventory (CEBI)

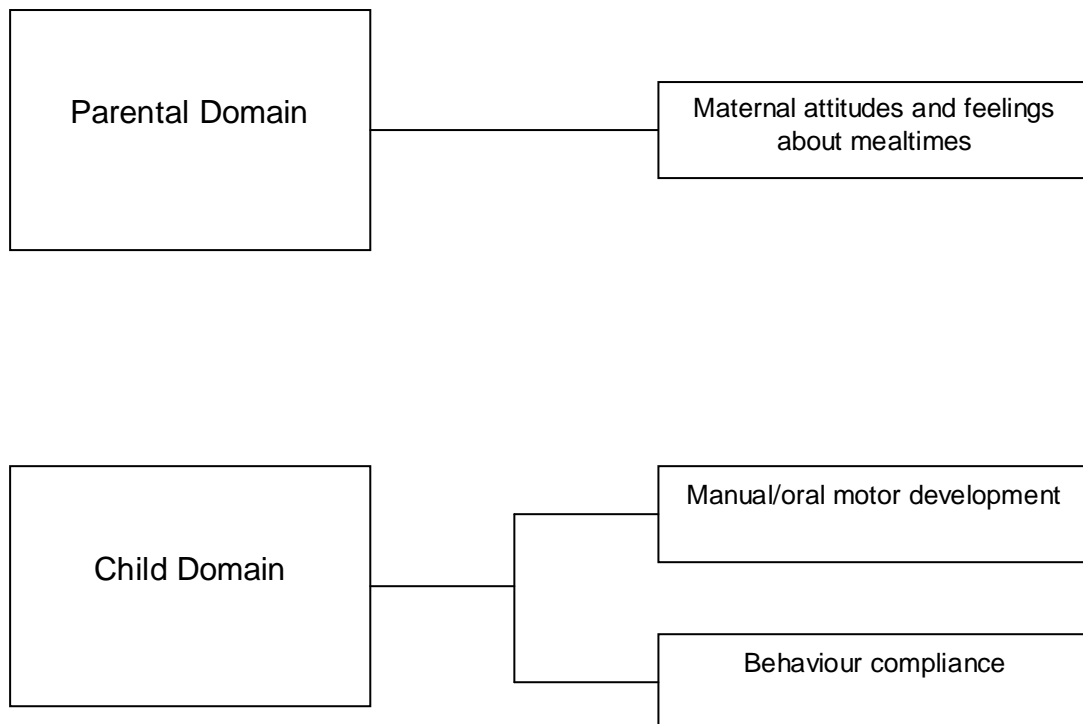
Further information is provided on the CEBI tool below. Note that this evaluation tool is optional as it measures outcome evaluation and requires two administrations — pre-workshop and one-month post workshop.

Background

The CEBI was originally developed and published by Archer (a clinical psychologist) and colleagues, in 1988 (Archer, Rosenbaun & Striener 1991). The CEBI was chosen for use in this manual as it is a well validated tool, developed by an expert panel of health professionals who were familiar with children’s eating and mealtime problems (Archer, Rosenbaun & Striener 1991). The CEBI is administered immediately prior to the group program and again at least one month after the group program.

The CEBI is a parent-report instrument, which measures childhood eating and mealtime behaviours. The tools measures eating and mealtime behaviours across two major domains: the parental domain and the child domain. Within the parental and child domain, the CEBI measures three main constructs: maternal attitudes and feelings about mealtimes; manual/oral motor development; and child behavioural compliance (see Figure 1).

Figure 1 Domains and corresponding constructs measured by the CEBI



The CEBI was developed according to a conceptual framework derived from a transactional/systematic understanding of parent-child relationships. The tool is intended for use in the assessment of eating and mealtime behaviours in children aged 2 – 12 years of age. The CEBI has 19 items, with 16 pertaining to the child and three pertaining to the parent.

In a study that aimed to determine the sensitivity and specificity, as determined by receiver operating characteristics (ROC), Archer and Streiner (1992) found an acceptable ROC curve, permitting the establishment of a clinical cut-off point. A score above the clinical cut-off point of 41 indicates that the child may have a significant eating and mealtime behaviour problem.

In a known group technique, Archer, Rosenbaum and Streiner (1991) tested the CEBI tool on 110 clinic subjects from outpatient paediatric and mental health clinics and 206 subjects from a non-clinic group. The clinic group subjects had developmental or medical disorders likely to place them at risk for eating and mealtime behaviours. These included autism, physical and mental disability and Prader-Willi Syndrome. The non-clinic subjects were normally developing children recruited from community medical practices. Both groups were administered the questionnaire and a retest was done for both groups four to six weeks after the first administration. The total problem eating scores were significantly higher for the clinic group than for the non-clinic group, confirming the construct validity of the CEBI. The intraclass correlation coefficient was 0.87 for the total problem eating score, and 0.84 for the percentage of items perceived to be a problem. Thus reliability testing shows that the CEBI is a reliable instrument when measuring eating and mealtime behaviours.

In a case study that described the assessment and treatment of food aversion in a four-year-old child, Archer and Szatmari (1990) found that the CEBI was able to reflect changes in eating and mealtime behaviours after intervention. This case study was consistent with previous findings by Archer, Cunningham and Whelan (1988) that the tool provides a sensitive measure of the severity of the problem(s) as perceived by the parent.

Internal consistency of the CEBI was assessed using the Cronbach's Alpha (Archer, Rosenbaum & Streiner 1991). Due to the tool's skip patterns provided for single parents and families with one child, separate alpha coefficients were determined. All were above 0.70 except for the single parent with more than one child group, which was markedly lower at 0.58. In the test-re-test reliability the intra-class correlation coefficient was 0.87 for the total problem eating score and 0.84 for the percentage of items perceived to be a problem. There have been no other published data on the reliability and validity of the CEBI.

Scoring of the CEBI

Attach a CEBI scoring cover sheet (Section 7) to each completed CEBI. There are two scores obtained from the CEBI. These are the total problem eating and mealtime behaviour score (indicates the severity of the child's problem eating and mealtime behaviours) and the total parent problem score (indicates if the parent perceives the child's behaviour as being a problem to them).

Obtaining the total problem eating and mealtime behaviour score

The CEBI utilises five-point Likert response scales to indicate how often each behaviour occurs (that is, 'never', 'seldom', 'sometimes', 'often', and 'always'). Single-parent families skip three items leaving a total of 16 items. Two-parent families with only one child skip one item leaving a total of 18 items. A weighted scoring system compensates for the omitted items (Archer, Rosenbaum & Streiner 1991). Items 1, 2, 4, 6 and 13 are scored in a negative direction, that is, response 1 is scored 5, 2 is scored 4, 3 is 3, 4 is 2, and 5 is 1. All other items are scored in a positive direction, that is, a response of 1 is scored 1, 2 is scored 2, 3 is 3, 4 is 4, and 5 is 5.

The following steps will assist you in obtaining the total problem eating and mealtime behaviour score.

1. add the numbers down each column
2. add the total number of each column to obtain the total column score
3. divide the total column score by the total number of questions answered and multiply by 19 to obtain the total problem eating and mealtime behaviour score

Scores can range from 15 to 95. Total problem eating and mealtime behaviour scores of 41 or higher may indicate the child has a clinically significant score.

Obtaining the total parent problem score

The respondent is asked if each of the items is a problem for them by answering 'Yes' or 'No' to the question 'Is this a problem for you?'. The total number of items perceived to be a problem to the parent is determined by adding the numbers of 'Yes' responses to the question 'Is this a problem for you?'. The greater the number of 'Yes' responses, the higher parent problem score. The lower the number of 'Yes' responses, the lower total parent problem score.

The following steps will assist you in obtaining the total parent problem score.

1. add the total number of YES responses
2. add the number of YES/NO questions answered
3. divide the total number of YES responses by the total number of YES/NO questions answered, and multiply by 100 to obtain the total parent problem score

Scores can range from 0% to 100%.

Further examples of scoring the CEBI are provided in Section 7, Master Document 9.