SLT4BF

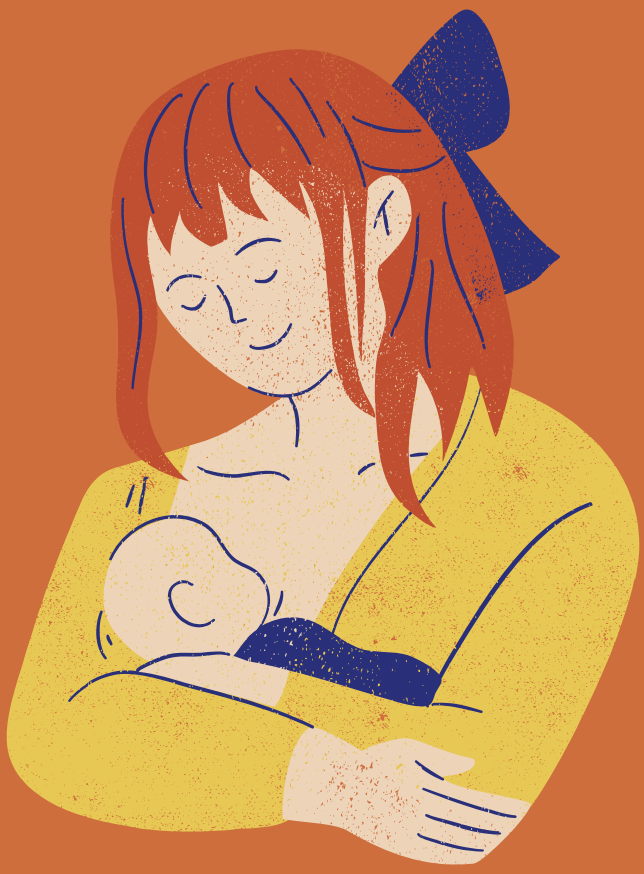
Speech and Language Therapy for Breastfeeding

Manual

Authors: **Ana Cláudia Lopes and Marisa Lousada**

Version **1.0. Dec. 2025**

Index



01

User guide

1. User guide

This manual was developed to provide a clear, structured, and replicable description of the SLT4BF project - Speech and Language Therapy for Breastfeeding, an intervention conducted by Speech and Language Therapists (SLTs) designed to support and optimize breastfeeding for migrant women receiving care in primary healthcare.

This document constitutes a scientific and educational tool, designed to ensure that the project can be implemented effectively in different contexts, maintaining the methodological integrity and quality that underpinned the previously conducted research.

1.1 Recipients

This manual was developed for use by SLTs who wish to implement SLT4BF within primary health care settings, hospitals, NGOs, or community services, in the context of interdisciplinary teamwork composed of professionals such as general practitioners, pediatricians, nurse specialists in maternal and obstetric health, nurse specialists in child and pediatric health, IBCLC (International Board Certified Lactation Consultants), physiotherapists, osteopaths, psychologists, and social workers.

1.2 Responsibility in relation to the original project.

This manual must be followed in its entirety in order to guarantee the maintenance of the impact demonstrated in the studies, maternal and child safety, multicultural applicability, as well as scientific rigor.

Cultural adaptations are expected and desirable (e.g., adjusting images used, metaphors, etc.), but structural adaptations (e.g., reducing evaluation moments or altering the nature of the intervention) can compromise the project's effectiveness.

1.3 Updates and improvements

This manual is a living document; therefore, as new studies are completed or new international recommendations emerge, the authors may make updated versions available. Regular visits to the project website are recommended to check for new updates.

02

Introduction and scientific basis

2. Introduction and scientific basis

Breastfeeding is recognized as one of the most effective public health interventions for improving maternal and child health outcomes globally (Victora et al., 2016). The World Health Organization (WHO) recommends exclusive breastfeeding until six months (World Health Organization, 2017). However, despite robust scientific evidence, marked inequalities persist between different population groups, particularly among migrant women.

Recent research shows that migrant women are more likely to face linguistic, cultural, socioeconomic, and structural barriers that hinder the initiation and maintenance of breastfeeding (Murcia-Baquero et al., 2024). These barriers include a lack of awareness of available health services to support breastfeeding, cultural practices in the postpartum period, lack of family support in the host country, and reduced access to healthcare professionals in general.

Simultaneously, in recent decades, recognition of the central role of SLTs in supporting breastfeeding has grown, especially in the areas of orofacial motor skills and newborn function (Mahurin-Smith & Watson Genna, 2019). The SLT is a professional with specialized training in the assessment and intervention of oral functions, namely sucking, breathing, and swallowing, which are fundamental pillars for effective, comfortable, and safe breastfeeding (American Speech-Language-Hearing Association, 2016).

The SLT4BF project emerges precisely from the intersection between these two domains:
(1) the technical and clinical competence of SLTs in providing direct breastfeeding support and
(2) the need for equitable and culturally sensitive care for migrant women.

2.1 Gaps identified and rationale for SLT4BF

Prior to the creation of SLT4BF, a number of gaps and/or needs were identified in primary healthcare in Portugal regarding breastfeeding support for migrant women, namely:

1. Lack of ongoing and specialized support for breastfeeding difficulties and orofacial motor disorders.
2. Lack of programs adapted to the cultural reality of migrant women.
3. Scarcity of replicable speech therapy-centered models with measurable outcomes.
4. The need to integrate assessment, intervention, and longitudinal follow-up.

2.2 Theoretical foundations that support the project

The SLT4BF is based on **three** structuring principles that justify the specialized intervention of the breastfeeding technician in supporting breastfeeding and the need for a culturally appropriate approach.

2.2.1 Clinical and scientific relevance of the SLTs in breastfeeding

The SLT is a professional whose basic training integrates orofacial anatomy and physiology, biomechanics of orofacial functions, the relationship between sucking, breathing, chewing, and swallowing, oral motor coordination, and disorders of oral motor function (American Speech-Language-Hearing Association, 2016). Thus, the SLT is competent to assess sucking, swallowing, and breathing patterns, identify early oral difficulties, differentiate functional from anatomical alterations, optimize latch, position, stability, and coordination, and clinically collaborate with interdisciplinary teams when necessary (Ana & Nunes, 2023; Mahurin-Smith & Watson Genna, 2019).

2.2.2 The need to develop culturally appropriate intervention programs

Breastfeeding is profoundly influenced by cultural beliefs, family practices, social expectations, perinatal traditions, and religious norms (Murcia-Baquero et al., 2024). Migrant women carry with them narratives and care models that often diverge from those of the host country, which can result in early cessation of breastfeeding (Izumi et al., 2023).

2.2.3 The need for longitudinal programs based on continuous follow-up

Scientific evidence demonstrates that support programs offered only at a single point in time are insufficient, since breastfeeding difficulties can arise at different stages postpartum. At the same time, it is known that maternal self-efficacy improves with continuous specialized support and that factors such as returning to work, increased infant needs, or social isolation can contribute to early weaning (Lancet, 2016; Lopes et al., 2025; Palaska et al., 2024; Sayres & Visentin, 2018).

2.3 Development and scientific validation of SLT4BF

The SLT4BF project was developed based on **five** scientific studies, each contributing to the creation of this implementation manual. This process ensured that the project was grounded in **scientific evidence** and addressed clinical, cultural, epidemiological, and organizational dimensions.

2.3.1 Systematic review of the literature

The first phase consisted of a **systematic literature review** that synthesized the available scientific evidence on breastfeeding support interventions aimed at migrant, refugee, and asylum-seeking women (Lopes et al., 2025). The results of this review showed that:
There are few robust and well-documented interventions to support breastfeeding among migrant women;

- Most lack structured cultural adaptation;
- none include assessment of the newborn's oromotor function;
- Interventions that incorporate cultural and educational elements, along with specialized support, show better results in exclusive breastfeeding.

This review provided the conceptual basis for the design of the SLT4BF, identifying methodological gaps and highlighting the need for an integrative and replicable model.

2.3.2 The need to develop culturally appropriate intervention programs

This second study described the **sociodemographic, cultural, and perinatal profile of the migrant women participating in the original project** (n = 20), encompassing their countries of origin, knowledge, attitudes, beliefs, and practices related to breastfeeding, the barriers they perceived, the support networks they had, and the specific needs identified (Lopes & Lousada, 2024).
The results demonstrated great cultural diversity, multiple barriers to accessing information, and a strong appreciation for cultural practices of origin. This characterization allowed for the definition of culturally sensitive communication strategies and the adaptation and creation of intervention materials suitable for different socioeconomic, cultural, and literacy levels (Lopes & Lousada, 2024).

2.3.3 Study with healthcare professionals (Nurses and Doctors)

Through a **structured online survey directed at physicians and nurses** working in primary healthcare (n = 53), this study (Lopes & Lousada, in review) assessed how these professionals perceive the role of the SLTs in breastfeeding, their referral patterns, identified training needs, perceptions regarding orofacial difficulties in newborns, and, finally, the existing gaps in interprofessional coordination.

The results showed:

- widespread lack of awareness about the potential contribution of SLTs;
- underreferral of babies with sucking difficulties;
- lack of clear referral protocols;
- high receptiveness among professionals to the creation of a structured project.

This study justified the need for formal integration of SLTs into the primary healthcare team and provided the basis for the training and interdisciplinary coordination component of the SLT4BF.

2.3.4 Pilot Study

The **pilot study** (n = 18) tested the first version of the SLT4BF project, evaluating the feasibility, acceptability, adherence, and preliminary effects of the project (Lopes & Lousada, 2025).

Main results:

- good sample adhesion;
- significant improvements in knowledge, attitudes, and practices;
- increased rates of exclusive breastfeeding at six months;
- reduction of pain and initial difficulties in breastfeeding;
- optimization of oromotor function after intervention;
- increased maternal self-efficacy in breastfeeding;
- improved quality of life after childbirth;
- validation of the workshop's cultural content.

This study allowed for adjustments to procedures, clarification of timelines, reformulation of materials, and the establishment of standardized evaluation protocols.

2.3.5 Randomized Clinical Trial

The **Randomized Controlled Trial** (RCT) (n = 74) constituted the central study for the scientific validation of SLT4BF. It demonstrated robust and consistent impact:

- significantly higher rates of exclusive breastfeeding at 1, 3, and 6 months in the experimental group;
- significant improvement in maternal self-efficacy throughout the follow-up period;
- improved quality of life after childbirth;
- improved oromotor performance;
- reduced need for supplementation;
- high maternal satisfaction and positive cultural integration.

The results confirmed that SLT4BF is effective and clinically relevant for improving breastfeeding trajectories in migrant women.

2.4 Development and scientific validation of SLT4BF

This project aims to:

1. To improve exclusive breastfeeding rates up to 6 months.
2. To strengthen self-efficacy in breastfeeding and improve maternal quality of life.
3. To promote efficient oromotor function in the newborn.
4. To reduce health inequalities between migrant women and the general population.
5. To ensure culturally appropriate and linguistically accessible care.
6. To create a replicable model for use in healthcare services and other contexts.

03 Target population

3. Target population

The SLT4BF project was specifically designed for pregnant migrant women receiving care in primary healthcare .

3.1 Inclusion criteria

Participants must meet all of the following criteria:

i) Maternal age ≥ 18 years

ii) Being a migrant
For this project, a migrant woman was considered to be any woman who:

- He does not have the country´s nationality in which the project is being implemented but resides in that country;
- It maintains cultural practices, linguistic practices, or social networks characteristic of the country of origin;
- acknowledges discrepancies between maternal health practices in the country of origin and those in the host country.

iii) Being pregnant
Women in their second or third trimester should be included preferentially due to the proximity of their expected delivery date.

iv) Stated intention to breastfeed
This includes mothers who wish to breastfeed exclusively, partially, or who are undecided but open to support.

(v) Availability to participate in all stages of the project.

vi) Ability to communicate in English, or another language with the support of a mediator/translator/community leader.

3.2 Exclusion criteria

i) Absolute medical contraindication to breastfeeding in the mother
For example: specific infections (HTLV-1/2) or specific pharmacological contraindications.

ii) Serious maternal illnesses that prevent active participation in the project.
Ex.: hospitalization, severe postpartum depression without adequate follow-up (in this case, referral to psychology/psychiatry is necessary, and readmission may follow if appropriate).

04

General Structure of the SLT4BF

4. General Structure of the SLT4BF

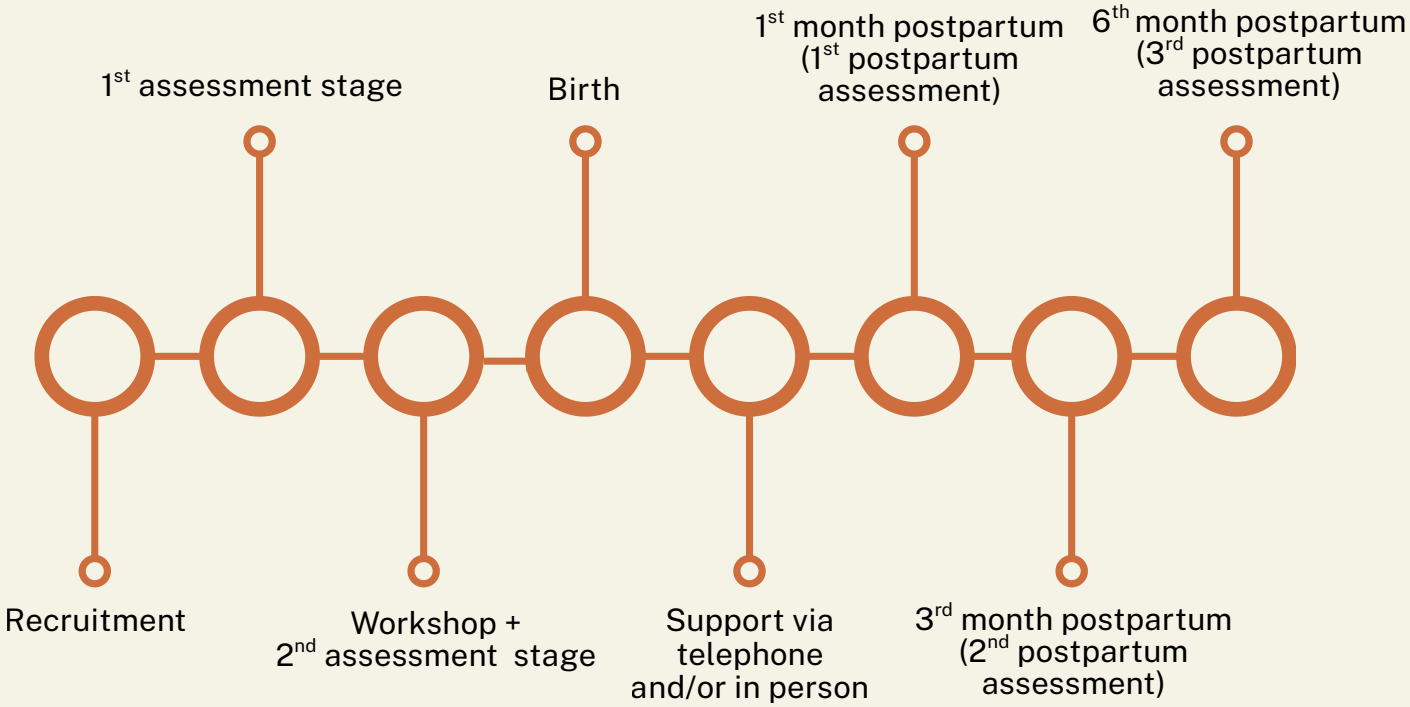
SLT4BF is a culturally sensitive project developed to support migrant women throughout their breastfeeding journey. The project structure was designed sequentially, with key moments coinciding with specific clinical and cultural needs identified throughout the project.

The project thus integrates four central pillars (figure 1):

1. Prenatal Workshop
2. Early postnatal assessment and intervention (0-72h)
3. Follow-up appointments at 1, 3, and 6 months.
4. Ongoing postpartum support (0-6 months)

Each component has its own objectives, content, procedures, and tools, working in a complementary and coordinated way to promote a more effective, comfortable, and confident breastfeeding journey.

Figure 1. SLT4BF diagram



4.1 Component 1 - Prenatal Workshop

The prenatal workshop constitutes the first structured contact with the project.

4.1.1 Goals

- strengthen knowledge, attitudes, beliefs, and practices related to breastfeeding;
- prepare migrant mothers for the start of breastfeeding in a culturally different country;
- reduce anxiety and increase self-efficacy;
- adapt the information to cultural practices and expectations;
- create a solid therapeutic relationship between the mothers and the SLT.

4.1.2 Procedures

- **Format:** group session
- **Duration:** ± 3 hours
- **Logistics: s**ending reminders to participants 24 hours in advance; confirming language and the need for a facilitator
- **Instruments used:** Knowledge, attitudes, and practices questionnaire on breastfeeding (Lopes & Lousada, 2022, see Appendix I) before and after the workshop; Prenatal BSES (Dennis & Faux, 1999).
- **Methodology:** demonstrations, pictograms, role-playing

4.1.3 Main contents

Main Topic	Subtopics	Duration
The importance of breastfeeding	Benefits of breastfeeding for mother and baby	20 minutes
	Consequences of not breastfeeding in terms of health outcomes	
	The importance of exclusive breastfeeding in the first six months of life	
Common myths about breastfeeding	Sleep and breastfeeding	25 minutes
	Hygiene and breastfeeding	
	Medication and breastfeeding	
	Relactation	
Anatomy and physiology of lactation	Knowledge of lactation physiology and the ability to apply it in practical situations	25 minutes
	Baby's readiness to feed	
	The principle of on-demand breastfeeding and the ability to explain its importance for establishing and maintaining lactation	
Grip and positioning	Effective positioning	20 minutes
	Effective latch	
	Effective suction	
Breast care	Common breastfeeding complications, how they arise, and how women can be helped to overcome them	20 minutes
	Prevention of pain and engorgement	
	Principles of manual milk extraction	

4.1.3 Main contents (continued)

Main Topic	Subtopics	Duration
Breastfeeding facilitators	Potential impact of practices in the delivery room, such as the effect of different pain relief methods and the importance of skin-to-skin	30 minutes
	Effects of using pacifiers and baby bottles	
	Bed sharing between parents and babies	
	Situations in which exclusive breastfeeding is not possible and how to support mothers with partial breastfeeding or formula feeding in these circumstances	
	Alternative feeding and infant care methods that can be used when breastfeeding is not possible	
Working mothers and breastfeeding	Labor rights of breastfeeding mothers	15 minutes
	Breast milk extraction using manual or electric pumps.	
	Conditions for storing breast milk	
Family support during breastfeeding	The importance of community support for breastfeeding	10 minutes
	Raising awareness about the role of community support networks in supporting breastfeeding women and as a resource for healthcare professionals	
Complementary feeding	Timely introduction of complementary foods and continuation of breastfeeding	15 minutes
	Responsive and respectful weaning	

4.2 Component 2 - Early postnatal assessment and intervention

Early intervention is one of the most critical elements of SLT4BF. This phase supports mothers when difficulties arise and when the impact of specialized guidance is greatest.

4.2.1 Goals

- observe breastfeeding;
- assess oromotor function and sucking pattern;
- identify initial difficulties;
- reduce maternal pain, if present;
- promote deep and efficient latch;
- integrate cultural postpartum practices into clinical guidance;
- Refer to other specialized professionals.

4.2.2 Procedures

- **Format:** individual session
- **Duration:** 60-90 minutes
- **Logistics:** Scheduling is preferably done 48 to 72 hours after delivery
- **Instrument applied:** NOMAS (Palmer et al., 1993)
- **Stages:**
  - brief interview about childbirth and the first breastfeeding moments;
  - structural and functional oromotor assessment;
  - detailed observation of breastfeeding;
  - functional intervention;
  - latch optimization techniques;
  - postural and environmental adjustments;
  - emotional reinforcement and cultural validation;
  - need for follow-up.

4.3 Component 3 - Follow-up consultations

Early intervention is one of the most critical elements of SLT4BF. This phase supports mothers when difficulties arise and when the impact of specialized guidance is greatest.

4.3.1 Follow-up appointments

Ongoing follow-up ensures that migrant women receive structured support during the critical phases of breastfeeding.

General objectives

- **r**eassess breastfeeding and oromotor function;
- monitor the evolution of self-efficacy and well-being;
- reinforce the learnings from the workshop;
- prevent premature weaning;
- adjust strategies to accommodate changes in both baby and mother;
- refer to other members of the interdisciplinary team whenever necessary.

4.3.2 1st month follow-up

Specific objectives

- assess oral skills;
- stabilize breastfeeding;
- identify transfer problems;
- promote self-confidence;
- analyze cultural routines, patterns, and practices.

Procedures

- **Format:** individual session
- **Duration:** 60-90 minutes
- **Logistics:** A reminder of the appointment will be sent 24 hours in advance; in case of a missed appointment, contact the mother to reschedule within 7 days.
- **Instruments applied:** BSES postpartum (Dennis & Faux, 1999) and MPP-QoL (Hill et al., 2006)

4.3.3 3rd month follow-up

Specific objectives

- assess oral skills;
- manage return to work (if applicable);
- strengthen self-confidence in breastfeeding.

Procedures

- **Format:** individual session
- **Duration:** 60-90 minutes
- **Logistics:** A reminder of the appointment will be sent 24 hours in advance; in case of a missed appointment, please contact the mother to reschedule within 7 days
- **Instrument applied:** BSES postpartum (Dennis & Faux, 1999) and MPP-QoL (Hill et al., 2006)

4.3.4 6th month follow-up

Specific objectives

- prepare the introduction of solid foods;
- integrate cultural food practices;
- promote the continuation of breastfeeding;
- strengthen maternal autonomy;
- assess oral patterns for future chewing.

Procedures

- **Format:** individual session
- **Duration:** 60-90 minutes
- **Logistics:** A reminder of the appointment will be sent 24 hours in advance; in case of a missed appointment, please contact the mother to reschedule within 7 days
- **Instruments applied:** BSES postpartum (Dennis & Faux, 1999) and MPP-QoL (Hill et al., 2006)

4.4 Component 4 - Ongoing support

Ongoing support throughout the first six months postpartum is a unique and highly effective component of SLT4BF, allowing for accessible and immediate contact.

4.4.1 Goals

Goals

- clarify emerging doubts;
- prevent problem escalation by overcoming minor difficulties;
- promote safety and peace of mind;
- provide guidance on scheduling when necessary;
- validate cultural practices and adapt recommendations.

4.4.2 Modality

- WhatsApp (text, audio or video call), phone call, SMS or other form of communication;
- Schedule defined by the service;
- Brief record of each contact.

05

Assessment: Standardized instruments and procedures

5. Assessment: Standardized instruments and procedures

Assessment in the SLT4BF is structured, standardized, and centered on the mother-infant dyad. It includes quantitative and qualitative components and is applied at various points in the project to monitor progress, identify difficulties early, and guide intervention.

All instruments used were selected based on available evidence, suitability for the migrant population, and the need to integrate functional and cultural aspects.

The evaluation is divided into four main domains:
1. Maternal Knowledge, Attitudes, and Practices
2. Breastfeeding Self-Efficacy (BSES)
3. Postpartum Quality of Life (MPP-QoL)
4. Orofacial Function and Observation of Breastfeeding (NOMAS)

5.1 Knowledge, Attitudes and Practices

The Mother's Breastfeeding Knowledge, Attitudes and Practices questionnaire (Lopes & Lousada, 2022) is applied before and after the prenatal workshop.

5.1.1 Purpose

To assess:
- knowledge about breastfeeding;
- positive/negative attitudes;
- expected practices;
- level of preparedness for breastfeeding;
- impact of the workshop.

5.1.2 Instrument structure

- Domain 1: Knowledge
- Domain 2: Attitudes and beliefs
- Domain 3: Practices

5.1.3 Interpretation

For each domain:
- Knowledge: Good (11-15 points), Fair (5-10 points), Poor (0-4 points)
- Attitudes and beliefs: Good (8-11 points), Fair (4-7 points), Bad (0-3 points)
- Practices: Good (6-8 points), Fair (3-5 points), Poor (0-2 points)

5.2 Maternal Self-Efficacy in Breastfeeding - BSES

The Breastfeeding Self-Efficacy Scale (Dennis & Faux, 1999) measures a mother's confidence in her ability to breastfeed successfully and is applied in late prenatal care (prenatal questionnaire) and in sessions at 1, 3, and 6 months postpartum (postpartum questionnaire).

5.2.1 Structure

14 items, Likert scale (1-5).

5.2.2 Interpretation

The higher the score, the higher the self-efficacy, consequently associated with sustained exclusive breastfeeding.

5.3 Postpartum Quality of Life - MPP-QoL

The Maternal Postpartum Quality of Life Questionnaire (MPP-QoL) (Hill et al., 2006) assesses the mother's perception of her physical, emotional, and social well-being. It is applied in at the 1, 3, and 6 months postpartum follow-ups.

5.3.1 Dimensions

- physical well-being
- emotional well-being
- social functioning
- relational functioning
- satisfaction with care

5.3.2 Interpretation

The higher the score, the higher the quality of life, consequently associated with sustained exclusive breastfeeding.

5.4 Suction Pattern - NOMAS

The Neonatal Oral Motor Assessment Scale (NOMAS) (Palmer et al., 1993) is used to identify normal or disorganized/dysfunctional sucking patterns. It should ideally be applied within the first 72 hours postpartum.

5.4.1 Use in SLT4BF

This protocol does not need to be applied to all babies, but it is recommended when there is:

- persistent maternal pain;
- ineffective latch;
- clear coordination difficulties;
- suspicion of oromotor dysfunction;
- doubts about the need for referencing.

5.4.2 Interpretation

NOMAS allows to:

- document the results of early intervention;
- guide clinical decisions;
- standardize the identification of oral motor disorders.

5.5 Functional Orofacial Observation

5.5.1 Components evaluated

Functional orofacial assessment includes:

a) Structural observation

- lips, cheeks, jaw, tongue frenulum and palate

b) Functional observation

- oral reflexes, lip function, tongue mobility, posture and tone, behavioral state, cervical control and proximal stability

c) Observation of breastfeeding

- Latch, mouth-nipple angle, rhythm, transfer, signs of maternal stress and pain.

5.5.2 Goals

- identify problems early;
- guide immediate functional intervention;
- document evolution;
- decide whether a referral is necessary.

5.5.3 Registration

Done in clinical notes.

06

Logistics and intervention implementation

6. Logistics and intervention implementation

Implementing SLT4BF requires logistical organization, service structuring, and internal procedures that ensure consistency, quality, and fidelity to the original model. This section describes the operational elements necessary for primary healthcare teams, or teams from other settings, to integrate the project efficiently, safely, and in a replicable manner.

6.1 Service requirements for implementation

6.1.1 Human resources

SLT, general practitioner, pediatrician, nurse specialist in maternal and obstetric health, nurse specialist in child and pediatric health, IBCLC, physiotherapist, osteopath, psychologist, and social worker.

6.1.2 Required spaces

Small/medium-sized room for the prenatal workshop and private office for follow-up appointments.

6.1.3 Essential materials

- Assessment instruments (KAPQ, BSES, MPP-QoL);
- Standardized registration forms;
- Telephone;
- Computer.

6.2 Service requirements for implementation

Fidelity is essential to ensure replicability and results similar to those evidenced in the SLT4BF studies.

6.2.1 Required elements

- Complete all stages of the project (workshop + 0-72 hours + 1 + 3 + 6 months);
- Apply all instruments at the defined times;
- Use standardized registration forms;
- Ensure a culturally sensitive approach;
- Ensure functional interventions aligned with the SLT4BF model.

6.2.2 Flexible elements

- Local (Health center, NGO, home, etc.);
- Language used;
- Duration adapted to cultural and individual needs;
- Workshop format (in-person or online).

07

Monitoring, indicators and impact assessment

7. Monitoring, indicators and impact assessment

Monitoring the SLT4BF is a continuous and systematic process that ensures the quality of implementation, fidelity to the original model, and the evaluation of clinical, cultural, and functional outcomes. This section describes essential indicators, data collection methods, and procedures necessary to assess the project's impact across different dimensions.

Monitoring is structured in **three** levels:

1. **Process indicators** - how the project is being implemented
2. **Outcome indicators** - impact on mothers and babies
3. **Quality and equity indicators** - cultural impact, accessibility and satisfaction.

7.1 Service requirements for implementation

They evaluate the operational reliability of SLT4BF.

7.1.1 Key indicators

1. **Participation in the prenatal workshop**
   - Percentage of registered women who attend;
   - Number of workshops held per month;
   - Average number of participants per workshop.

2. **Coverage of postnatal visits (0-72h)**
   - Percentage of mothers who receive visits within the scheduled period;
   - Average time between delivery and intervention.

3. **Joining the program**
   - Percentage of mothers present at the 1, 3, and 6-month follow-ups;
   - Number of absences and reschedulings;
   - Reasons for absence (including cultural or logistical barriers).

4. **Commitment to continued support**
   - Number of contacts per mother;
   - Average response time;
   - Most frequent reasons.

5. **Compliance with the instruments**
   - Percentage of correct applications of KAP, BSE-SF, and MPP-QoL.

7.2 Outcome indicators (clinical and psychological impact)

They are evaluating the direct effect of SLT4BF on mothers and babies.

7.2.1 Exclusive Breastfeeding

Assessed in the 1st, 3rd, and 6th months follow-ups.

Indicators:
- Percentage of exclusive breastfeeding by duration;
- Comparison with the local baseline (when applicable);
- Comparison with national benchmark studies.

7.2.2 Maternal self-efficacy (BSE)

Assessed during prenatal care, and in the 1st, 3rd, and 6th months follow-ups.

Indicators:
- Scoring across all 4 stages;
- longitudinal evolution by mother;
- correlation with exclusive breastfeeding.

7.2.3 Postpartum Quality of Life (MPP-QoL)

Assessed in the 1st, 3rd, and 6th months follow-ups.

Indicators:
- overall score average;
- subscales (physical, emotional, social);
- evolution over the 6 months.

7.2.4 Baby's oromotor function

Assessed in the immediate postpartum period, and in the 1st, 3rd, and 6th months follow-ups.

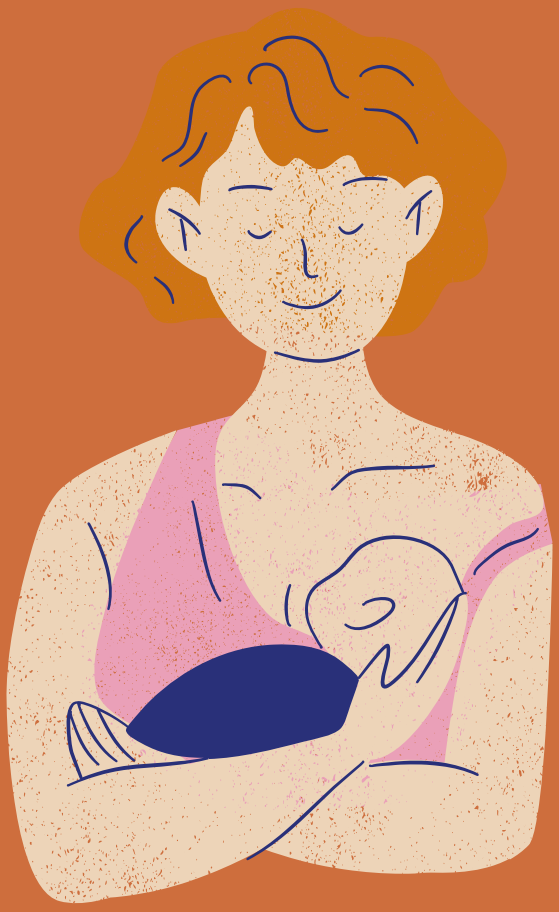
Indicators:
- Description of initial clinical findings;
- evolution of suction;
- need for further intervention.

7.3 Quality and equity indicators

The migrant population requires specific indicators related to:

Indicators:

- Recording and resolving cultural misunderstandings;
- Language barriers identified;
- Use of cultural mediator;
- Subjective assessment of maternal satisfaction during consultations;
- Analysis of adherence.



08 Conclusion

8. Conclusion

The SLT4BF - Speech and Language Therapy for Breastfeeding - is an innovative and scientifically grounded project to support breastfeeding among migrant women, having been validated in primary healthcare. Developed from a robust set of studies, the project demonstrates that it is possible to combine specialized clinical intervention, cultural expertise, and longitudinal follow-up with consistent and significant results.

The manual presented here offers a complete description of the project, covering the overall structure, assessment tools, techniques, operational procedures, ethical principles, and materials needed for implementation. Each section has been designed to enable teams of professionals to apply SLT4BF rigorously, safely, and sensitively, maintaining fidelity to the original model and ensuring the quality of care provided.

The SLT4BF project aims not only to improve breastfeeding indicators, self-efficacy, and quality of life for mothers but also to contribute to more equitable, inclusive, and culturally responsive health services. By placing the SLT at the center, the project reinforces the value of interdisciplinarity and early intervention in vulnerable populations.

The implementation of this project represents a commitment to science, to the humanization of care, and to social justice. It is believed that its application in different contexts, such as primary health care, community services, or NGOs, could broaden its impact, promote health equity, and support mothers and babies during one of the most sensitive and defining moments of their lives.

09 References

9. References

- American Speech-Language-Hearing Association. (2016). Scope of practice in speech-language pathology [Scope of Practice]. www.asha.org/policy/
- Dennis, C., & Faux, L. (1999). Development and Psychometric Testing of the Breastfeeding Self-Efficacy Scale. In Research in Nursing & Health (Vol. 22).
- Hill, P. D., Aldag, J. C., Hekel, B., Riner, G., & Bloomfield, P. (2006). Maternal Postpartum Quality of Life Questionnaire. Journal of Nursing Measurement, 14(3), 205–220. https://doi.org/10.1891/JNM-V14I3A005
- Lopes, A., & Lousada, M. (n.d.). Enhancing Maternal and Infant Health: A Systematic Review of Breastfeeding Interventions Among Refugee, Migrant, and Asylum Seeker Populations. Archives de Pédiatrie, In press.
- Lopes, A., & Lousada, M. (2024). Breastfeeding knowledge, attitudes, beliefs and practices of refugee, migrant and asylum seeker women in Portugal. BMC Public Health, 24(1). https://doi.org/10.1186/S12889-024-17849-8
- Lopes, A., & Lousada, M. (2025). Feasibility, Acceptability, and Preliminary Effects of Speech-Language Therapy in Breastfeeding Support: A Mixed Methods Pilot Study with Migrant Women in Portugal. International Journal of Language & Communication Disorders, 60(3). https://doi.org/https://doi.org/10.1111/1460-6984.70026
- Mahurin-Smith, J., & Watson Genna, C. (2019). Assisting the Breastfeeding Dyad: A Guide for Speech-Language Pathologists. Perspectives of the ASHA Special Interest Groups, 4 (3) (SIG13), 502–506. https://doi.org/https://doi.org/10.1044/persp3.SIG13.47
- Mendes, I., Azeredo, Z., & Rodrigues, R. (2014). Maternal postpartum quality of life questionnaire (MAPP-QOL): Validation of the Portuguese version in first-time mothers. Revista de Saúde Pública, 48(2), 239–247. https://doi.org/10.1590/s0034-8910.2014048004956
- Murcia-Baquero, L. M., Sandoval-Pinto, E., Guerrero, C. H., Flores, M. de L. L., Sierra-Diaz, E., & Cremades, R. (2024). The Phenomenon of Human Migration on the Breastfeeding Practices of Migrant Women: A Scoping Review. Cureus, 16(7), e63614. https://doi.org/10.7759/CUREUS.63614
- Palmer, M., Crawley, K., & Blanco, I. (1993). Neonatal Oral-Motor Assessment scale: a reliability study. Journal of Perinatology, 13(1), 28–35.
- Santos, V., & Bárcia, S. (2009). Contributo para a adaptação transcultural e validação da “Breastfeeding Self-Efficacy Scale – Short Form” – versão portuguesa. Revista Portuguesa de Clínica Geral, 25(4), 363–369.
- Victora, C., Bahl, R., Barros, A., França, G., Horton, S., Krasevec, J., Murch, S., Sankar, M., Walker, N., Rollins, N., Allen, K., Dharmage, S., Lodge, C., Peres, K., Bhandari, N., Chowdhury, R., Sinha, B., Taneja, S., Giugliani, E., … Richter, L. (2016). Breastfeeding in the 21st century: Epidemiology, mechanisms, and lifelong effect. The Lancet, 387(10017), 475–490. https://doi.org/10.1016/S0140-6736(15)01024-7
- World Health Organization. (2017). Guideline: protecting, promoting and supporting breastfeeding in facilities providing maternity and newborn services.

10 Appendix

10. Appendix I

Mother's breastfeeding knowledge, attitude and practices

(Lopes & Lousada, 2022)

Introduction

This questionnaire intends to gather information regarding your knowledge, attitudes, beliefs, and practices when it comes to breastfeeding. It has to be filled in by a mother of a future mother and it takes approximately ten minutes.

There are no “right” or “wrong” answers, so please, answer solely according to your opinion. Please, do not leave any questions unanswered.

I-Knowledge

1. For each of the following statements, please, mark with a cross the one you think is the correct answer for you (Yes, No, or I don't know).

Statements	Yes	No	I don't know
If the mother's breasts are small, she may not have enough milk to feed her child.			
It is common for women to not produce enough milk to feed their children.			
Colostrum is good for the child			
Breastfeeding is only beneficial for the child			
If the mother's nipples are flat or inverted, she may not be able to breastfeed her child			
Complementary foods should be introduced at six months of age			
Breast milk is superior to formula milk in meeting a child's necessary dietary requirements			
Breast milk loses its benefits when it is pumped out or stored			
It is good for children to be breastfed until they are 24 months of age			
The food that the mother eats has no relationship to breastfeeding			
Breastfeeding helps in the correct development of orofacial structures			
Breast milk is sufficient for a child during the first six months of life			
If the mother is sick, she cannot continue to breastfeed her child			
Babies who are breastfed are less prone to certain diseases than children who are fed infant formula			
The mother should not attempt to breastfeed her child if she is planning to return to work or study, as she will not be able to have her child beside her			

2. Where do you get your breastfeeding knowledge? (Mark with a circle one or more options)

Doctors	Nurses/midwives	Friends
Family	TV programs	Advertising
Magazines	Breastfeeding classes	Internet
Others	If others, which?	

I- Attitudes and Beliefs

1. For each of the following statements, please, mark with a cross your opinion (agree, neutral, or disagree).

Statements	**Agree**	**Neutral**	**Disagree**
Breastfeeding was/is going to be hard for me			
I might gain weight if I breastfeed/ I did gain weight because I breastfed			
My hair might fall because I breastfeed/ My hair fell because I breastfed			
I do not like to give pumped breast milk to my child because it is not beneficial for him			
I stop breastfeeding every time I take medication			
I have to stop eating/stopped eating certain foods because I breastfed			
I plan to breastfeed any future children			
I think that breastfeeding classes are important			
I think women should not breastfeed in public places			
I think that partners might feel excluded when the mother breastfeeds			
I think I have to breastfeed even if do not want to			

1. If you want to breastfeed your baby, what are your reasons? (Mark with a circle one or more options)

Religious background	Advice from healthcare professionals	Child health
Media	Cleanliness and easy preparation	Personal determination or experience
Encouragement from mother/mother-in-law	Encouragement from husband	Economic reasons
Other	If other, which?	

III – Practices

1. For each of the following statements, please, mark with a cross the answer most suitable to your last experience (Yes or No).

Statements	**Yes**	**No**
I attended/am attending breastfeeding classes during my pregnancy or after my delivery		
If not, why not?		
I have previous experience with breastfeeding		
The initiation of breastfeeding happened/ will happen immediately and within the first hour of life of my child		
If not, why?		
My child was not given/is not going to be given ready-made liquid formula in the hospital		
My child was given/is going to be given a pacifier right after the delivery		
If so, by whom? (mother, doctor, father, grandmother, etc.)		
breastfed or intend to breastfeed my last child for 6 months only with breastmilk		
If not, not?		
I introduced or plan to introduce any foods besides breastmilk to my child before six months		
If yes, why and which foods?		
I breastfed or intend to breastfeed my child until 24 months		
If not, why?		

Notes:

Contacts

Authors: Ana Cláudia Lopes & Marisa Lousada

Email anac.lopes@ua.pt

This work was funded by Portuguese national funds, through FCT — Foundation for Science and Technology, I.P., within the scope of the CINTESIS R&D Unit (UIDB/4255/2020 and UIDP/4255/2020) and the RISE project (LA/P/0053/2020), CLUL (UIDB/00214/2020), as well as by a PhD Scholarship (UI/BD/152235/2021).