

***Teacher's Guide for
IMNCI Training of
Students***

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SECTION A: GUIDELINES FOR IMNCI TRAINING OF MEDICAL STUDENTS

This training of medical students in the Integrated Management of Neonatal and Childhood Illness (IMNCI) focuses on the outpatient management of common causes of neonatal and child mortality. This does not replace the usual paediatric training. It is, in fact additional training that does not require the use of laboratory tests and x-rays and can be used in primary health care settings e.g. village/PHC posting during internship, and by physicians at the PHC or dispensaries.

Teaching Methods

There are no lectures in this course. The following teaching methods will be used:

Classroom / Side-Room

Self-reading of the module by the students in presence of the teacher

Demonstration of how to use the IMNCI charts to assess and classify sick young infants and children

Video exercises followed by group discussions

Role plays (scripted and unscripted) followed by group discussion

Clinical Sessions

Demonstration by the teacher how to assess and classify a sick young infant or a child

Assessment, classification and management of cases individually by all students

Observation and feedback by the teacher

c. ***What does a Facilitator do?***

As a facilitator, you do 3 basic things:

1. You INSTRUCT:
 - Make sure that each participant understands how to work through the materials and what he is expected to do in each module and each exercise.
 - Answer the participant's questions as they occur.

- Explain any information that the participant finds confusing, and help him understand the main purpose of each exercise.
- Lead group activities, such as group discussions, oral drills, video exercises, and role plays, to ensure that learning objectives are met.
- Provide additional explanations or practice to improve skills and understanding.
- Explain what to do in each clinical practice session.
- Model good clinical skills, including communication skills, during clinical practice sessions.
- Give guidance and feedback as needed during clinical practice sessions.

2. You MOTIVATE:

- Compliment the participant on his correct answers, improvements or progress.
- Make sure that there are no major obstacles to learning (such as too much noise or not enough light).

3. You MANAGE:

- Plan ahead and obtain all supplies needed each day, so that they are in the classroom or taken to the clinic when needed.
- Make sure that movements from classroom to clinic and back are efficient.
- Monitor the progress of each participant.

Course Structure

The IMNCI course will be conducted over 2 weeks of clinical paediatric posting. It will require 12 sessions of 3 hours each. The activities to be conducted in each of these sessions are summarized in the table below:

Schedule of the IMNCI Teaching

<i>Day</i>	<i>Read module</i>	<i>Video / Role play</i>	<i>Clinical practice</i>
1	Introduction to IMNCI; Outpatient management of the sick young infant: read up to diarrhoea	Video: Possible serious bacterial infection / jaundice	-
2	-	-	Assess & Classify the sick young infant: up to diarrhoea
3	Read to complete assess and classify the sick young infant	Video: Assess diarrhoea, Assess breastfeeding and correct positioning and attachment	-
4	-	-	Assess & classify the sick young infant
5	Read identify treatment and treat the young infant	Role plays: treatment, breastfeeding counselling	-
6	-	-	Assess, classify and treat the sick young infant
7	Outpatient management of the sick child age 2 months up to 5 years: read up to fever	Video: General danger signs, cough or difficult breathing and diarrhoea	-
8	-	-	Assess and classify children 2mo-5yr with cough or difficult breathing & diarrhoea
9	Read to complete assess and classify the sick child	Video: Fever, malnutrition, complete assessment	-
10	-	-	Assess and classify children 2mo-5yr
11	Identify treatment and assessment of feeding, counsel the mother	Role play	
12	-	-	Assess, classify and treat and counsel children 2mo-5yr

NOTE: For students each days session is likely to take 3-4 hrs. When conducting teachers Training every two days tasks are finished in one day. Total duration for teachers Training is 6 days.

3. Checklist of instructional materials needed

ITEM NEEDED	NUMBER NEEDED
<i>Facilitator Guide</i>	1 for each facilitator
Student's IMNCI module, chart book and Photograph Book	1 for each facilitator and 1 for each participant
Videotape	(Course Director will inform you where your group will view the video.)
Set of 5 IMNCI Case Management Charts (Large version -- to display on the wall)	1 set
Young Infant Recording Forms (for exercises in module)	5 for each participant plus some extras
Sick young infant and sick child recording forms for outpatient clinical practice	2 forms per participant for each clinical practice session

4. Checklist of supplies needed for work on modules

Supplies needed for each person include:

- | | |
|-----------------------|---|
| * name tag and holder | * felt tip pen |
| * paper | * highlighter |
| * ball point pen | * 2 pencils |
| * eraser | * folder or large envelope to collect answer sheets |

Supplies needed for each group include:

- | | |
|---|----------------------------|
| * paper clips | * 2 rolls transparent tape |
| * pencil sharpener | * rubber bands |
| * stapler and staples | * 1 roll masking tape |
| * extra pencils and erasers | * scissors |
| * flipchart pad and markers OR blackboard and chalk | |

Access is needed to a video player. Your Course Director will tell you where this is. In addition, certain exercises require special supplies such as drugs, ORS packets, or a baby doll (or rolled towel to hold like a baby) for role plays.

5. Facilitator techniques

A. Techniques for Motivating Students

Encourage Interaction

Keep Students Involved in Discussions

Keep the Session Focused and Lively

- * Present information conversationally rather than read it.
- * Speak clearly. Vary the pitch and speed of your voice.
- * Use examples from your own experience, and ask students for examples from their experience.

B. Manage any Problems

Some students may talk too much. Here are some suggestions on how to handle an overly talkative participant:

- * Do not call on this person first after asking a question.
- * After a participant has gone on for some time say, "You have had an opportunity to express your views. Let's hear what some of the other students have to say on this point." Then rephrase the question and invite other students to respond, or call on someone else immediately by saying, "Dr. Samua, you had your hand up a few minutes ago."
- * When the participant pauses, break in quickly and ask to hear from another member of the group or ask a question of the group, such as, "What do the rest of you think about this point?"
- * Record the participant's main idea on the flipchart. As he continues to talk about the idea, point to it on the flipchart and say, "Thank you, we have already covered your suggestion." Then ask the group for another idea.

- * Do not ask the talkative participant any more questions. If he answers all the questions directed to the group, ask for an answer from another individual specifically or from a specific subgroup. (For example, ask, "Does anyone on this side of the table have an idea?")

Try to identify students who have difficulty understanding or speaking the course language. Speak slowly and distinctly so you can be more easily understood and encourage the participant in his efforts to communicate.

C. Reinforce Students' Efforts

As a facilitator, you will have your own style of interacting with students. However, a few techniques for reinforcing students' efforts include:

- * avoiding use of facial expressions or comments that could cause students to feel embarrassed,
- * sitting or bending down to be on the same level as the participant when talking to him,
- * answering questions thoughtfully, rather than hurriedly,
- * encouraging students to speak to you by allowing them time,
- * appearing interested, saying "That's a good question/suggestion."

Reinforce students who:

- * try hard
- * ask for an explanation of a confusing point
- * participate in group discussions
- * help other students (without distracting them by talking at length about irrelevant matters).

D. When Students are working:

- * Look available, interested and ready to help.
- * Watch the students as they work, and offer individual help if you see a participant looking troubled, staring into space, not writing answers, or not turning pages. These are clues that the participant may need help.
- * Encourage students to ask you questions whenever they would like some help.
- * If important issues or questions arise when you are talking with an individual, make note of them to discuss later with the entire group.
- * If a question arises which you feel you cannot answer adequately, obtain assistance as soon as possible from another facilitator or the Course Director.

E. When Leading a Group Discussion:

- * Plan to conduct the group discussion at a time when you are sure that all students will have completed the preceding work. Wait to announce this time until most students are ready, so that others will not hurry.
- * Before beginning the discussion, refer to the appropriate notes in this guide to remind yourself of the purpose of the discussion and the major points to make.
- * Always begin the group discussion by telling the students the purpose of the discussion.
- * Often there is no single correct answer that needs to be agreed on in a discussion. Just be sure the conclusions of the group are reasonable and that all students understand how the conclusions were reached.
- * Try to get most of the group members involved in the discussion. Record key ideas on a flipchart as they are offered. Keep your participation to a minimum, but ask questions to keep the discussion active and on track.
- * Always summarize, or ask a participant to summarize, what was discussed in the exercise.
- * Reinforce the students for their good work by (for example):
 - praising them for the list they compiled,
 - commenting on their understanding,

- commenting on their creative or useful suggestions,
- Praising them for their ability to work together as a group.

F. *When Coordinating a Role Play:*

- * Before the role play, refer to the appropriate notes in this guide to remind yourself of the purpose of the role play, roles to be assigned, background information, and major points to make in the group discussion afterwards.
- * As students come to you for instructions before the role play,
 - assign roles. At first, select individuals who are outgoing rather than shy, perhaps by asking for volunteers. If necessary, a facilitator may be a model for the group by acting in an early role play.
 - give role play students any props needed, for example, a baby doll, drugs.
 - give role play students any background information needed. (There is usually some information for the "mother" which can be photocopied or clipped from this guide.)
 - suggest that role play students speak loudly.
 - allow preparation time for role play students.
- * When everyone is ready, arrange seating/placement of individuals involved. Have the "mother" and "physician" stand or sit apart from the rest of the group, where everyone can see them.
- * Begin by introducing the players in their roles and stating the purpose or situation. For example, you may need to describe the age of the child, assessment results, and any treatment already given.
- * Interrupt if the players are having tremendous difficulty or have strayed from the purpose of the role play.
- * When the role play is finished, thank the players. Ensure that feedback offered by the rest of the group is supportive. First discuss things done well. Then discuss things that could be improved.

- * Try to get all group members involved in discussion after the role play. In many cases, there are questions given in the module to help structure the discussion.
- * Ask students to summarize what they learned from the role play.

G. DURING CLINICAL PRACTICE SESSIONS

Clinical Practice Objectives

Clinical practice is an essential part of the *Integrated Management of Neonatal and Childhood Illness* course. The course provides practice in using case management skills so that students can perform them proficiently. Students learn about the skills by reading information in the modules or seeing demonstrations on videotape. They then use the information by doing case studies. Finally and most importantly, in clinical practice, students practice using their skills with real sick children and young infants.

General Objectives: During clinical practice sessions, students will:

- * see examples of signs of illness in real children.
- * see demonstrations of how to manage sick children and young infants according to the case management charts.
- * practice assessing, classifying and treating sick children and young infants and counselling mothers about food, fluids, and when to return.
- * receive feedback about how well they have performed the skill and guidance about how to strengthen particular skills.
- * gain experience and confidence in using the skills as described on the case management charts.

Outpatient Sessions take place in outpatient clinics. Each small group of students travels to an outpatient clinic each day and is supervised by its facilitators. The focus of the outpatient session is to provide practice of the case management process with sick children and young infants.

In outpatient sessions, students will:

- see sick children and young infants who have been brought to the clinic by their mothers.
- practice assessing and classifying sick children and young infants according to the *ASSESS & CLASSIFY* charts.

- practice identifying the child's treatment by using the "Identify Treatment" column on the *ASSESS & CLASSIFY* charts.
- practice treating sick children and young infants according to the *TREAT THE YOUNG INFANT AND COUNSEL THE MOTHER* charts.
- practice counselling mothers about food, fluids, and when to return according to the *COUNSEL THE MOTHER* chart.
- practice using good communications skills when assessing, treating and counselling mothers of sick children and young infants.

Inpatient Sessions take place on an inpatient ward. There each small group is led by the inpatient instructor. The focus of the inpatient sessions is to practice assessing and classifying clinical signs, especially signs of severe illness. During inpatient sessions, students will:

- see as many examples as possible of signs of severe classifications from the *ASSESS & CLASSIFY* charts, including signs not frequently seen.
- practice assessing and classifying sick children and young infants according to the *ASSESS & CLASSIFY* charts, focusing especially on the assessment of general danger signs, other signs of severe illness, and signs which are particularly difficult to assess (for example, chest indrawing and skin pinch).
- practice treating dehydration according to Plans B and C as described on the *TREAT THE CHILD* chart.
- practice helping mothers to correct positioning and attachment.

Students practice the case management steps as part of a case management process. The clinical practice skills are presented in the order they are being learned in the modules. In each clinical session, students use the skills they have learned up to and including that day's session. This allows students to gain experience and confidence in performing skills introduced in earlier sessions.

To make sure that students receive as much guidance as possible in mastering the clinical skills, the outpatient facilitator and inpatient instructor give particular attention and feedback to the new skill being practiced that day. If any participant has difficulty with a particular skill, the facilitator or inpatient instructor continues working with the participant on that skill in subsequent sessions until the participant can perform the skill with confidence.

Role of Facilitator During Clinical Sessions

The role of the facilitator during outpatient sessions is to:

1. **Do all necessary preparations** for carrying out the outpatient sessions.
2. **Explain** the session objectives and make sure the students know what to do during each outpatient session.
3. **Demonstrate** the case management skills described on the charts. Demonstrate the skills exactly as students should do them when they return to their own clinics.
4. **Observe** the students' progress throughout the outpatient sessions and provide feedback and guidance as needed.
5. **Be available** to answer questions during the outpatient sessions.
6. **Lead discussions** to summarize and monitor the students' performance.
7. **Complete the Checklist for Monitoring Outpatient Sessions** to record students' performance and the cases managed.

(There should be 1 to 2 facilitators for every group of 6 to 10 students.)

SECTION B: DAILY LIST OF ACTIVITIES.**DAY 1: LIST OF ACTIVITIES**

S NO	Introduction		Time
1	Distribute module. Students read pages 1 through 7	Self reading	30 min
2	Introduction to IMNCI & how to choose appropriate case management charts	Group discussion	10 min
3	Read page 8-9	Self reading	10 min
4	Introduce Chart Booklet	Demonstration	10 min
5	Read page 10-12	Self reading	10 min
6	Introduce Young Infant Recording Form	Demonstration	15 min
7	Demonstration: Classification table	Demonstration	15 min
8	Students read pages 13 through 19	Self reading	20 min
9	Conduct video demonstration and exercise on possible bacterial infection / jaundice	Video	40 min
10	Facilitator leads brief discussion of example photographs. Participants work individually to identify the remaining photographs.	Group discussion	30 min

INTRODUCTION OF YOURSELF AND PARTICIPANTS

If participants do not know you or do not know each other, introduce yourself as a facilitator of this course and write your name on the blackboard or flipchart. As the participants introduce themselves, write their names on the blackboard or flipchart. Leave the list of names in a place where everyone can see it to help you and the participants learn each other's names.

ADMINISTRATIVE TASKS

There may be some administrative tasks or announcements that you should address. For example, you may need to explain the arrangements that have been made for lunches, the daily transportation of participants from their lodging to the course, or payment of per diem.

EXPLANATION OF YOUR ROLE AS FACILITATOR

Explain to participants that, as facilitator (and along with your co-facilitator, if you have one), your role throughout this course will be to:

- * guide them through the course activities
- * answer questions as they arise or find the answer if you do not know
- * clarify information they find confusing
- * give individual feedback on exercises where indicated
- * lead group discussions, drills, video exercises and role plays
- * prepare them for each clinical session (explain what they will do and what to take)
- * in outpatient sessions, demonstrate tasks
- * observe and help them as needed during their practice in outpatient sessions.

1	Distribute module. Students read pages 1 through 7	Self reading	30 min
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2	Introduction to IMNCI & how to choose appropriate case management charts	Group discussion	10 min
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To summarize, review the following points:

- A. The case management process is described on 5 charts: (Point to or walk to each of the charts on the wall as you say its title.)

- * *ASSESS AND CLASSIFY THE SICK YOUNG INFANT*
- * *TREAT THE SICK YOUNG INFANT AND COUNSEL THE MOTHER*

These 2 charts are used for sick young infant's age up to 2 months.

Management of the sick child age 2 months up to 5 years is summarized on the following charts:

- * *ASSESS & CLASSIFY THE SICK CHILD AGE 2 MONTHS UP TO 5 YEARS*
- * *TREAT THE CHILD*
- * *COUNSEL THE MOTHER & FOLLOW UP*

- B. To use the charts, you first decide which age group the child is in:

- Age up to 2 months
- Age 2 months up to 5 years

- * If the child is 2 months up to 5 years, select the chart *ASSESS AND CLASSIFY THE SICK CHILD AGE 2 MONTHS UP TO 5 YEARS*

"Up to 5 years" means the child has not yet had his fifth birthday. (Be sure that students understand "up to" means up to but not including that age.)

- * A child who is 2 months old would be in the group 2 months up to 5 years, not in the group up to 2 months.

- * **If the child is not yet 2 months of age, the child is considered a young infant.** Use the chart *ASSESS, CLASSIFY AND TREAT THE SICK YOUNG INFANT*.

- C. In this course you will learn to do all the steps on these charts. You will learn from:

- * The student's module (Hold up the module)
 - * Clinical sessions. You will go to clinics to practice managing sick children using what you have learned.
- D. Ask students if they have any questions about what they read in the module or heard in the opening session. Answer their questions, but **do not explain how to use the case management charts**. This will be taught in the rest of the course.

Note: Students may ask whether the case management charts can be used for children who are older or younger than the age groups specified on the charts. If they ask this question during discussion of *Introduction*, explain as simply as possible, such as by using only the explanation in bold italics below. If they ask later in the course, after they have learned how to assess and classify, they could understand the entire explanation below.

Why not use this process for children age 5 years or more?

The case management process is designed for children less than 5 years of age. Although much of the advice on treatment of pneumonia, diarrhoea, malaria, measles and malnutrition is applicable to older children, the assessment and classification of older children would differ. For example, the cut-off rates for determining fast breathing would be different, because normal breathing rates are slower in older children. Chest indrawing is not a reliable sign of severe pneumonia as children get older and the bones of the chest become more firm. Older children can talk and so are able to report additional symptoms which are not in these charts, such as chest pain and headache, which may be useful in deciding whether pneumonia or malaria is present.

In addition, certain treatment recommendations or advice to the mother on feeding would differ for children over 5 years of age. The drug dosing tables only apply to children up to 5 years. The feeding advice for older children may differ and they may have different feeding problems.

To summarize: ***Much of the treatment advice may be helpful for a child age 5 years or more. However, because of differences in the clinical signs of older and younger children who have these illnesses, this assessment and classification process using these clinical signs is not recommended for older children***

3	Read page 8-9	Self reading	10 min
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4	Introduce Chart Booklet	Demonstration	10 min
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Distribute the chart booklet. Introduce it by briefly stating the following points:

- * *This booklet is called the chart booklet. You can use the wall chart to find information about assessing and classifying sick children or you can use the chart booklet. Both describe the same process. The chart booklet contains the same information that is on the wall charts. It also contains blank copies of the two Recording Forms.*
- * *The chart you are learning now is called ASSESS AND CLASSIFY THE SICK YOUNG INFANT AGE UP TO 2 MONTHS. All the assess column boxes and all the classification tables from the ASSESS & CLASSIFY wall chart are in the first section of the chart booklet. The assessment box and classification table for each main symptom are grouped together like this.*

(Show a sample page such as the one for possible serious bacterial infection so students see it matches with the assess box, the classification arrow and classification table on the wall chart.)

The chart booklet is convenient to use when you work with modules at a table and when you practice assessing and classifying sick children during clinical sessions. We will begin using the chart booklet today so you can become familiar with it before using it during clinical practice.

Look at the table of contents on the cover. It tells you where to find each part of the chart. The ASSESS & CLASSIFY charts are listed in the first column. They begin on page 1 where you see the charts that tell you how to check for possible bacterial infection / jaundice.

Ask if students have any questions.

5	Read page 10-12	Self reading	10 min
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6	Introduce Young Infant Recording Form	Demonstration	15 min
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DEMONSTRATION: INTRODUCE THE RECORDING FORM

Materials needed to do this demonstration:

- * Enlarged Blank Recording Form

To conduct the demonstration:

When all the students are ready, introduce the form by briefly mentioning each part of the form and its purpose. Use enlarged Recording Form, to help students see each part as you refer to it. For example:

"This is a Recording Form. Its purpose is to help you record information collected about the infant's signs and symptoms when you do exercises in the module and when you see infants during clinical practice sessions.

There are 2 sides to the form. The front side is similar to the ASSESS & CLASSIFY chart. The other side of the form has spaces for you to use when you plan the infant's treatment. You will first use the front side only. You will learn how to use the reverse side later in the course.

Look at the top of the front side of the form. (Point to each space as you say:) There are spaces for writing:

- * *the infant's name, age, weight and temperature.*
- * *the mother's answer about the infant's problems.*
- * *whether this is an initial visit or follow-up visit.*

Look at how the Recording Form is arranged. Notice that:

- * *the form is divided into 2 columns: (point to each column as you mention it) one is for "Assess" and the other is for "Classify." These two columns relate to the Assess and Classify columns on the ASSESS & CLASSIFY wall chart.*
- * *Point to the relevant columns on the wall chart and then on the Recording Form to show their correspondence.*

Look at the Assess column on the wall chart. It shows the assessment steps for assessing the infant's signs and symptoms. Here is the Assess column on the Recording Form where you record any signs and symptoms that you find are present. Here on the form is where you will record information about (point as you say the name) signs of possible bacterial infection / severe jaundice. You can see that the assessment steps under check for possible bacterial infection / severe jaundice on the chart are the same as on this form.

There is also a section for recording information about the infant's immunization status.

- * *Here is the "Classify As" column on the chart, and here is the Classify column on the Recording Form. You record the infant's classifications in this column.*

When you use the Recording Form while you are working with sick infants during clinical sessions, you record information by:

- * *circling any sign that is present, like this (circle a sign on the Recording Form). If the infant does not have the sign, you do not need to circle anything.*
- * *ticking YES or NO at appropriate places (point to the Yes ___ No ___ blanks on the enlargement.)*
- * *writing specific information in spaces such as the one for recording the number of breaths per minute (point to where this number is written) or the number of days a sign or symptom has been present (point to the "for how long?" question in the diarrhoea section.*
- * *writing the classification.*

As you work through this module, you will only see the part of the form for the symptoms and signs you have learned.

At the end of the demonstration, ask if there are any questions.

7	Demonstration: Classification table	Demonstration	15 min
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DEMONSTRATION: INTRODUCE THE CLASSIFICATION TABLES AND DEMONSTRATE HOW TO CLASSIFY POSSIBLE BACTERIAL INFECTION / JAUNDICE

Materials needed:

- * Enlargement of Classification Table – Possible Bacterial Infection / Jaundice

To conduct the demonstration:

Ask if there are any questions about recognizing signs for assessing a infant with Possible Bacterial Infection / Jaundice

When there are no further questions, tell students that the purpose of the demonstration is to introduce the classification tables and how to use them to classify illness in sick infants. Details about individual classifications will be described later.

Point to the wall chart and show students where the classification tables are located on the chart. Mention points such as:

- Most of the classification tables on the *ASSESS & CLASSIFY* chart have 3 rows. There are some exceptions, for example the table for **POSSIBLE BACTERIAL INFECTION / JAUNDICE** has 3 arms with 2 rows in 2 arms and only one row in the third arm. Similarly the table for diarrhoea has 3 arms with 3 rows in the first arm and a single row in second and third arms.
- Each row is coloured either pink, yellow, or green.
- The colour of the row helps to identify rapidly whether the infant has a serious disease requiring urgent attention.
- A classification in a *pink* row means the infant has a severe classification and needs urgent attention and referral or admission for inpatient care.
- A classification in a *yellow* row means the infant needs a specific medical treatment such as an appropriate antibiotic or other treatment. Treatment includes teaching the mother how to give the oral drugs or to treat local infections at home. The physician advises her about caring for the infant at home and when she should return.
- A classification in a *green* row is not given a specific medical treatment such as antibiotics or other treatments. The physician teaches the mother how to care for her infant at home. For example, you might advise her on feeding her sick infant.

Now display the enlargement of the classification table for **POSSIBLE BACTERIAL INFECTION / JAUNDICE**. Point out the Signs column and the Classify As column. As you talk through the steps for classifying **POSSIBLE BACTERIAL INFECTION / JAUNDICE** listed in the module, point to each row as you describe it. For example:

CLASSIFY all young infants for **POSSIBLE BACTERIAL INFECTION**. There are two classifications for **POSSIBLE BACTERIAL INFECTION**:

- *Look at the top pink row. Does the infant have any of the signs of POSSIBLE SERIOUS BACTERIAL INFECTION? If the infant has any of the signs in the top row, select the severe classification, **POSSIBLE SERIOUS BACTERIAL INFECTION**.*

- *If the infant does not have any signs of Possible Serious Bacterial Infection, look at the yellow row. Does the young infant have umbilicus red or draining pus, pus draining from the ear or less than 10 skin pustules? If the infant has any of these signs and does not have a severe classification, select the classification in the yellow row, **LOCAL BACTERIAL INFECTION**.*

CLASSIFY if the infant has jaundice. There are two possible classifications for jaundice.

- *Look at the top pink row. A sick young infant who has yellow palms and soles or age < 24 hours or age 14 days or more has signs of Severe Jaundice. Select the classification **SEVERE JAUNDICE**.*
- *If the infant does not have any signs of Severe Jaundice, look at the yellow row. If the **sick** young infant does not have yellow palms and soles or age > 24 hours or age <14 days, select classification **JAUNDICE** in the yellow row.*

CLASSIFY if the temperature is between 35.5- 36.4°C . There is one classification.

- **A sick young infant with LOW BODY TEMPERATURE** is one who has temperature less than 36.5°C but above 35.4°C. This could be due to inadequate clothing in cold weather or be a sign of bacterial infection. This infant should be warmed using skin-to-skin contact (Kangaroo Mother Care) for 1 hour and then reassessed

Use the enlarged classification table for POSSIBLE BACTERIAL INFECTION / JAUNDICE. Point to the enlargement as you continue:

- *Always start at the top of the classification table. If the infant has signs from more than one row of different colours, always select the more serious classification under one arm. For example if the infant has a sign in the top pink row and a sign in the second yellow row, select the more serious classification, **POSSIBLE SERIOUS BACTERIAL INFECTION**.*

Answer any questions.

8	Students read pages 13 through 19	Self reading	20 min
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9	Conduct video demonstration and exercise on possible bacterial infection / jaundice	Video	40 min
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VIDEO DEMONSTRATION & EXERCISE: ASSESSING FOR POSSIBLE BACTERIAL INFECTION / JAUNDICE

If the video is being shown in a room other than where the students are working on the module, ask the students to take their modules with them when they go to where the video is being shown. They should also bring a pencil and writing pad.

To conduct this video exercise:

Introduce students to the procedure for video exercises in this course. Explain that during video exercises they will:

- * see videotaped demonstrations and exercises
- * do exercises and record their answers on the writing pad
- * check their own answers to exercises and case studies with those on the video.

Tell students that they will watch a demonstration of how to assess a young infant for possible bacterial infection. The video will show examples of abnormal signs.

Start the videotape. Because this is the first video exercise in the course, students may not be clear about how to proceed. During the first few video exercises, watch the students. If they are not writing answers, encourage them to do so. If they seem to be having difficulty, replay the exercise so they can see the exercise again, develop an answer and write it.

Follow the instructions given in the video. Pause the video and give explanations or discuss what the students are seeing as needed to be sure the students understand how to assess these signs.

Note: Chest indrawing may be a difficult sign for students to identify the first time. It may take several trials for the participant to feel comfortable with the sign.

- * If any participant has difficulty with this sign, repeat an example from the video. Talk through with the participant where to look for chest

indrawing, pointing to where the chest wall goes in when the infant breathes in.

- * Some students may need help determining when the infant is breathing IN. Show an example from the video. Point to where on the infant's chest the participant should be looking. Each time the infant breathes in, say "IN" to help the participant clearly see where to look and what to look for.
- * It may be helpful to stop the video and ask students to point to the place where he sees chest indrawing. This will help you to check if students are looking at the appropriate place for identifying chest indrawing. Repeat the exercises on the video until you feel confident that the students understand where to look for chest indrawing and can identify the sign in each child shown in this exercise.

At the end of the video, lead a short discussion. If students are not clear about the assessment of any signs, rewind the video and show the relevant portions again.

Important points to emphasize about the assessment in this video are:

- * Counting breathing requires close attention to one spot on the chest or abdomen.
- * It is particularly difficult to count breathing in a young infant because of irregular breathing. Repeat any count which is 60 or more.
- * Chest indrawing requires knowing when the infant is breathing in and out. Practice this when you see infants in the clinic later.
- * Grunting can be difficult to hear. Many infants make occasional noises. Grunting is regular, soft, short noises when breathing out (at the beginning of expiration). (If students are having trouble understanding grunting, demonstrate it.)
- * You need to look very closely for nasal flaring -- the nostrils of a young infant are small!

10	Facilitator leads brief discussion of example photographs. Participants work individually to identify the remaining photographs.	Group discussion	30 min
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Group discussion of photographs of a young infant's umbilicus, skin pustules and jaundice.

Talk about each of the first 2 photographs, pointing out or having participants point out and tell how they recognize the signs.

Then ask participants to work individually to study the rest of the photographs for this exercise and write answers in the chart in the module.

Give feedback in a group discussion: For each photograph, ask a participant to explain what he sees in the photograph. Discuss as necessary so that participants understand how to recognize and infected umbilicus.

Give the participants a copy of the answer sheet

Photograph 1: Normal umbilicus in a newborn

Photograph 2: An umbilicus with redness extending to the skin of the Abdomen

Umbilicus	Normal	Redness or draining pus
Photograph 3		√
Photograph 4	√	
Photograph 5		√

Photograph 6: Many skin pustules

Photograph 7: A big boil

Photograph 8: Jaundice (Palms and soles not yellow)

Photograph 9: Jaundice (Yellow palms and soles)

Skin	Normal	Many pustules	A big boil	Jaundice	Yellow palms and soles
Photograph 10		√			
Photograph 11			√		
Photograph 12					√

DAY 2: LIST OF ACTIVITIES

CLINICAL SESSION

Assess & classify the sick young infant for possible bacterial infection / jaundice	Demonstration	30 min
Allocation of cases to students	Observation and feedback	2.5 Hrs

To Prepare	Choose young infants with signs of bacterial infection, jaundice or diarrhoea. Also choose some normal young infants and some young infants with as many of the signs of bacterial infection as possible.
Participant Objectives	<ul style="list-style-type: none"> -Assess and classify a young infant for bacterial infection Jaundice or Diarrhoea. -Record findings on the Young Infant Recording Form; use the <i>YOUNG INFANT</i> chart to choose classifications; -Obtain additional practice assessing some signs.
Instructor Responsibilities	<p>Demonstrate assessment of a young infant for bacterial infection, Jaundice and diarrhoea.</p> <p>Demonstrate infants with as many signs of bacterial infection available: severe chest indrawing and mild chest indrawing; nasal flaring; bulging fontanelle; umbilical redness at the tip and redness extending to the skin of the abdomen; many and severe pustules and some skin pustules; normal and less than normal movement. Also show a normal infant.</p> <p>Assign participants to young infants. Observe and assist as needed while participants assess and classify.</p> <p>Conduct rounds. Have all participants assess as many of the signs above as possible.</p> <p>Show any young infants with infrequently seen signs.</p>
At the end of the session:	<p>Summarize the session with participants.</p> <p>Complete the Monitoring Checklist.</p>

DEMONSTRATION: CHECK FOR POSSIBLE BACTERIAL INFECTION / JAUNDICE

Remind students that they should use Young Infant Recording Form during the clinical session.

Demonstrate how to assess and classify a young infant for possible bacterial infection / severe jaundice. During the assessment, describe what you are doing. Do not start discussions or lecture during the demonstration. Record the findings on a recording form.

Classify the young infant according to the signs and symptoms present. Make sure you and the students look into the chart booklet while classifying. Answer any questions the students may have.

DAY 3: LIST OF ACTIVITIES

S NO	Task	Method	Time
1	Students read pages 20 through 23	Self reading	20 min
2	Classification of Diarrhoea	Demonstration	20 min
3	Students read pages 24 through 28	Self reading	20 min
4	Classification of Feeding problem	Demonstration	20 min
5	Conduct video demonstration and exercise on assessment for Diarrhoea & Feeding problem	Video	40 min
6	Lead a drill on reading a weight for age chart for young infants.	Drill	10 min
7	Participants study the example photographs. Facilitator leads brief group discussion of example photographs. Participants work individually on rest of photographs.	Group discussion Individual	20 min
8	Students read pages 29 through 31	Self reading	15 min

1	Students read pages 20 through 23	Self reading	20 min
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2	Classification of Diarrhoea	Demonstration	20 min
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DEMONSTRATION: Classify dehydration

When all the participants have read through Assess Diarrhoea, gather the participants together for a short demonstration.

Materials needed:

- * Enlarged Blank Recording Form
- * Enlarged Classification Table - Dehydration

To conduct this demonstration:

1. Briefly review with participants the steps for classifying Possible bacterial infection/ jaundice.
2. Introduce the enlarged classification table for diarrhoea. Explain that classifying diarrhoea is slightly different than classifying Possible bacterial infection/ jaundice.
 - All Young Infants with diarrhoea are classified for dehydration. To select a classification for dehydration, the Young Infants must have two or more of the signs in either the pink or yellow row. One sign is not enough to select a pink or yellow classification. If the Young Infants has only one sign in a row, look at the next row.
 - * Only classify Severe persistent diarrhoea if the Young Infants has had diarrhoea lasting 14 days or more.
 - * Only classify Severe dysentery if the Young Infants has blood in the stool.

3	Students read pages 24 through 28	Self reading	20 min
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4	Classification of Feeding problem	Demonstration	20 min
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Demonstration: Classify Feeding problem or Malnutrition

Materials needed:

- * Enlarged Blank Recording Form
- * Enlarged Classification Table – Feeding Problem or Malnutrition

To conduct this demonstration:

Briefly review with participants the steps for classifying Feeding Problem or Malnutrition.

Display the enlarged section of the chart:

Tell participants that there are two sections in this chart, above and below the dotted lines. The part below the dotted line deals with assessing feeding. Point to the enlargement and review the steps of assessing feeding problem or malnutrition.

Look at the top row.

A young infant with the signs not able to feed or no attachment at all or no sucking at all has the classification Not Able To Feed-Possible Serious Bacterial Infection

A young infant with very low weight for age has the classification Severe Malnutrition.

Now assess for breastfeeding.

- * If the infant is exclusively breastfed without difficulty and is not low weight for age, there is no need to assess breastfeeding.
- * If the infant is not breastfed at all, do not assess breastfeeding.
- * If the infant has a serious problem requiring urgent referral to a hospital, do not assess breastfeeding. In these situations, classify the feeding based on the information that you have already.

If the mother's answers or the infant's weight indicates a difficulty, observe a breastfeed. Low weight for age is often due to low birth weight. Low birth weight infants are particularly likely to have a problem with breastfeeding. The four signs of good attachment. (Point to these on the enlargement as you review them.)

An infant who is well attached does not cause any pain or discomfort to the breast. Good attachment allows the infant to suckle effectively. Signs of effective suckling are:

The infant suckles with slow deep sucks you may see or hear swallowing
An infant who is suckling effectively may pause sometimes and then start suckling again. Remember that the mother should allow her baby to finish the feed and release the breast himself. A baby who has been suckling effectively will be satisfied after a breastfeed.

A Young Infant with no signs in the pink row and having any of the signs Not well attached to breast or Not suckling effectively or Less than 8 breastfeeds in 24 hours or Receives other foods or drinks or Low weight for age or Thrush or Breast or nipple problem has the Classification Feeding Problem or Low Weight.

If a Young Infant is Not Low Weight For Age and has No Other Signs Of Inadequate Feeding has the Classification No Feeding Problem.

REMEMBER: At least one classification needs to be picked in all Young Infants.

5	Conduct video demonstration and exercise on assessment for Diarrhoea & Feeding problem	Video	40 min
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Video case study -- Group viewing and discussion of assessing and classifying a young infant for possible bacterial infection and diarrhoea

When all the participants are ready, arrange for them to move to where the video exercise will be shown. Make sure they bring their modules and chart booklets.

To conduct the video exercise:

1. Tell participants that during this exercise they will watch a case study of a young infant. The young infant will be assessed for possible bacterial infection and diarrhoea. They should record their assessment results on the recording form in the module. They will be given time to classify the young infant and write the classifications on the form.
2. Ask if participants have any questions before you start the video. When there are no additional questions, start the video.

3. At the end of the video, lead a short discussion. If participants are not clear about the assessment of any signs, rewind the video and show the relevant portions again. If there are any questions about the classifications, review the infant's signs and how they were classified, referring to a classification table.

Video demonstration of breastfeeding assessment

If possible, in the room where the video is being shown, display the enlarged section of the chart: Assess Breastfeeding.

Tell participants that they will see a demonstration of assessing feeding. In particular they will see how to assess breastfeeding. Point to the enlargement and review the steps of assessing breastfeeding. (Or, ask participants to turn in the chart booklet to the *YOUNG INFANT* chart and read over the steps to assess feeding of a young infant.) The video will show examples of the signs of good and poor attachment and effective and ineffective suckling.

Ask if participants have any questions before you start the video. When there are no additional questions, start the videotape.

At the end of the video, lead a short discussion. If participants are not clear about the assessment of any signs, rewind the video and show the relevant portions again.

Important points to emphasize in the discussion are:

- * The four signs of good attachment. (Point to these on the enlargement as you review them.)
- * An infant who is well attached does not cause any pain or discomfort to the breast. Good attachment allows the infant to suckle effectively. Signs of effective suckling are:
 - the infant suckles with slow deep sucks
 - you may see or hear swallowing
- * An infant who is suckling effectively may pause sometimes and then start suckling again. Remember that the mother should allow her baby to finish the feed and release the breast himself. A baby who has been suckling effectively will be satisfied after a breastfeed.

6	Lead a drill on reading a weight for age chart for young infants.	Drill	10 min
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DRILL: Reading a weight for age chart for young infants

Tell participants that in this drill they will practice determining whether a young infant is low weight for age. Ask them to take out their chart booklets and turn to the Weight for Age chart.

Ask the question in the left column. Participants should answer in turn.

QUESTIONS	ANSWERS	
Which curve do you look at to assess weight for age in a child age up to 2 months ?	Very low weight for age (bottom curve) or Low weight for age (middle curve)	
If a young infant's weight is <u>on</u> the curve for low weight for age, is he low weight for age?	No- <u>Below</u> the curve is low weight. <u>On</u> or <u>above</u> the curve is not.	
Does the bottom of the Weight for Age chart show age in weeks or months for young infants?	Weeks	
If a young infant has <u>very</u> low weight for age, does this count as low weight for age?	Yes	
IS THE YOUNG INFANT LOW WEIGHT FOR AGE IF		
the infant is:	and weighs?	
3 weeks old	3 kg	no
6 weeks old	4 kg	no
7 weeks old	3 kg	yes
4 weeks old	2.5 kg	yes
5 weeks old	3.25 kg	no
2 weeks old	2.5 kg	yes
6 weeks old	3.75 kg	no
5 weeks old	2.9 kg	yes

7	Participants study the example photographs. Facilitator leads brief group discussion of example photographs. Participants work individually on rest of photographs.	Group discussion Individual	20 min
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Group discussion of example photographs. Then individual work followed by individual feedback -- Recognizing signs of good attachment

Talk about each of the first 4 photographs, pointing out or having participants point out and tell how they can see each sign of good or poor attachment. Participants should refer to the descriptions of each photograph in their module.

Then ask participants to work individually to study the rest of the photographs for this exercise and write the answers in the chart. They should look for the signs of good attachment present in each photograph and make an overall assessment of the infant's attachment.

Photo	Signs of Good Attachment				Assessment	Comments
	Chin Touching Breast	Mouth Wide Open	Lower Lip Turned Outward	More Areola Showing Above		
13	yes (almost)	yes	yes	yes	Good attachment	
14	no	no	yes	no (equal above and below)	Not well attached	
15	yes	no	no	yes	Not well attached	lower lip turned in
16	no	no	no	no	Not well attached	cheeks pulled in
17	yes	yes	yes	can not see	Good attachment	

18	<i>no</i>	<i>no</i>	<i>yes</i>	<i>no (equal above and below)</i>	<i>Not well attached</i>	
19	<i>yes</i>	<i>yes</i>	<i>yes</i>	<i>yes</i>	<i>Good attachme nt</i>	
20	<i>yes (almost)</i>	<i>yes</i>	<i>yes</i>	<i>yes</i>	<i>Good attachme nt</i>	
21	<i>yes</i>	<i>no</i>	<i>no</i>	<i>no (more below)</i>	<i>Not well attached</i>	<i>lower lip turned in</i>

Photographs 22 and 23: White patches (thrush) in the mouth of an infant.
Home visits for newborns (only for those conducting or supervising home visits)

8	Students read pages 29 through 31	Self reading	15 min
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DAY 4: LIST OF ACTIVITIES

CLINICAL SESSION

Assess & classify the sick young infant for Diarrhoea & Feeding problem and Malnutrition	Demonstration 30 min
Allocation of cases to students	Observation and feedback 2.5 Hrs

INPATIENT SESSION

Assess Breastfeeding attachment and Suckling in a Young Infant

To Prepare	Choose young infants with signs of bacterial infection, Jaundice or diarrhoea or feeding problems to demonstrate as many of the clinical signs as possible. Also choose some normal young infants. Identify any young infants with infrequently seen signs.
Participant Objectives	-Assess a young infant breastfeeding. -Assess and classify a young infant for bacterial infection, Jaundice, diarrhoea, and feeding. -Record findings on the Young Infant Recording Form; use chart to choose classifications; record them.
the D Instructor er Phases Demonstra and classify 3.	Demonstrate a normal young infant feeding well, showing the signs of attachment and suckling. demonstrate a young infant with feeding problems. Assign participants to young infants. Ask them to assess the young infant. observe and assist as needed. Conduct rounds. Have all participants assess as many of the signs present as possible. Show any young infants with infrequently seen signs.
At the end of the session	Summarize the session with participants. Complete the Monitoring Checklist.

Look for young infants throughout the hospital, in any areas where you may find young infants age up to 2 months (age up to 59 days). Check in areas such as a newborn nursery, neonatal unit, maternity ward which may have some infants, and the pediatric ward.

DAY 5: LIST OF ACTIVITIES

S NO	Task	Method	Time
1	Students read pages 32 through 33	Self reading	10 Min
2	Demonstration: Identify treatment	Demonstration	15 Min
3	Explaining to the mother that the young infant needs referral	Role play	30 min
4	Demonstration: Using young infant recording Form for Identifying treatment	Demonstration	15 Min
5	Students read page 34 through 41	Self reading	15 Min
6	Teaching a mother to give oral drugs at home using good communication skills	Demonstration Role play	30 min
7	Students read page 42 through 47	Self reading	15 Min
8	Helping positioning for breast feeding	Video Demonstration	10 Min
9	Home visits for newborns. Only for those involved with conducting or supervising home visits	Gp Discussion	20 min
10	Role Play Home Visit	Role play	30 min
11	Home care for young infant	Drill	10 Min

1	Students read pages 32 through 33	Self reading	10 Min
2	Demonstration: Identify treatment	Demonstration	15 Min

Demonstration: Identify treatment

Materials needed:

- * Wall Chart

Briefly introduce the final step on the *ASSESS & CLASSIFY* chart: "Identify Treatment."

Pointing to the wall chart, explain how to read across the chart from each classification to the list of treatments needed. Point to the treatments listed for POSSIBLE SERIOUS BACTERIAL INFECTION/JAUNDICE and read them aloud (or have a participant read them aloud). Point to the treatments listed for diarrhoea with NO DEHYDRATION and read them aloud (or have a participant read them aloud). Ask a participant to point to the classification SEVERE DYSENTERY. Then ask that participant to read aloud the treatments for dysentery.

Explain that severe classifications usually require referral to a hospital. For these classifications, the instruction is given to "Refer URGENTLY to hospital." Point to the treatment instructions for POSSIBLE SERIOUS BACTERIAL INFECTION and read them aloud, including the instruction to refer urgently to the hospital. Ask a participant to point to the classification SEVERE PERSISTENT DIARRHOEA. Then ask that participant to read aloud the treatments for SEVERE PERSISTENT DIARRHOEA .

If a young infant has only one classification, it is easy to see what to do for the infant. However, many sick young infants have more than one classification. For example, a young infant may have both LOCAL BACTERIAL INFECTION and FEEDING PROBLEM OR LOW WEIGHT.

When a young infant has more than one classification, you must look in more than one place on the *ASSESS & CLASSIFY THE SICK YOUNG INFANT* chart to see the treatments listed.

For some young infants, the *ASSESS & CLASSIFY THE SICK YOUNG INFANT* chart says "Refer URGENTLY to hospital." By hospital, we mean a health facility with inpatient beds, supplies and expertise to treat a very sick young infant or child. If you work in a health facility with inpatient beds, referral may mean admission to the inpatient department of your own facility.

If the young infant must be referred urgently, you must decide which treatments to do before referral. Some treatments are not necessary before referral

3	Explaining to the mother that the young infant needs referral	Role play	30 min
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ROLE PLAY: EXPLAINING TO A MOTHER THAT HER YOUNG INFANT NEEDS URGENT REFERRAL

Select someone to play the role of the physician and someone to play the role of Parvati's mother. Explain that all others will observe and be prepared to comment afterwards. Have everyone read the Role Play Instructions in the module. Also give the "mother" the instructions in the box below, which may be cut out or photocopied.

After the role play, discuss whether or not this mother seems likely to go to the hospital, and why or why not. Discuss whether all necessary information was given to the mother and all possible help provided.

Role Play - Instructions for Parvati's Mother

Parvati is your second child. You also have a 2-year-old son who is at home with your mother-in-law. You did not bring much money with you to the clinic, and you do not know how to get to the hospital. Your home is about 20 minutes away on foot, and you walked to the clinic. There is no phone in your home, but there is a phone at the place where your husband works. You want to do what is right for Parvati, but you are concerned about how to get to the hospital, how to communicate with your family, etc. Also, a child in your community recently died at the hospital. You are very worried that Parvati is going to die.

4	Demonstration: Using young infant recording Form for Identifying treatment	Demonstration	15 Min
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Demonstration of how to use the back of the Sick Young Infant Recording Form

Hold up a blank Sick Young Infant Recording Form. Until now participants have used only the front. Explain that they are now going to record treatments needed on the back.

Show how to fold the "Classify" column of the Sick Young Infant Recording Form so that it can be seen while looking at the back of the form. Ask the participants to fold a blank form and refer to the form of Jatin (page 31 of student book).

As participants look at the folded back of recording form, make the following points:

- * Look at the *ASSESS & CLASSIFY* chart to find the treatments needed for each classification.
- * List treatments needed on the back of the form, across from the classification.
- * Write only the relevant treatments.

Point to Jatin's first classification, LOCAL BACTERIAL INFECTION, and read aloud all the listed treatments. Show participants that only the relevant treatments were listed on the form. The treatment that begins "If child also has a severe classification...." is not written, because Jatin does not have a severe classification. ("Advise when to return immediately" is already on the form, so does not need to be written again.)

Ask another participant to point to Jatin's next classifications, SOME DEHYDRATION and also FEEDING PROBLEM, and read aloud the treatments.

- * Follow-up times are listed in the treatments. These mean to tell the mother to return in a certain number of days. You may abbreviate "Follow-up" as

"F/up." If you list several follow-up times, you will tell the mother the earliest, definite time. This is the time to record in the designated space on the recording form.

- * Notice that the recording form already lists the item, "Advise mother when to return immediately," because it is needed for every sick child going home. Do not list this again. (You will learn the signs, which indicate when to return immediately later in this module.)
- * Notice the space on the back of the recording form to record immunizations needed today.
- * If the same treatment is needed for more than one classification, you only need to list it once.

5	Students read page 34 through 41	Self reading	15 Min
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6	Teaching a mother to give oral drugs at home using good communication skills	Demonstration Role play	30 min
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ROLE PLAY: TEACHING A MOTHER TO GIVE ORAL DRUGS AT HOME USING GOOD COMMUNICATION SKILLS

Purpose: To demonstrate good communication skills and show the steps of teaching a mother to give oral drugs to a sick child.

Highlights of the case:

A physician has decided that a young infant named Gita needs the antibiotic cotrimoxazole. The physician must now teach Gita's mother how to give the drug to the infant.

Gather the following supplies. Put them on a table in front of the students.

- * Doll or other "baby"
- * Bottle of cotrimoxazole tablets
- * Drug envelope with label
- * Pen
- * Cup and spoon

The role play script is on the following pages.

Read the role of the physician. Ask a co-facilitator or a participant to read the role of the mother. You will need an extra copy of the script for the person who plays the mother (you may use the one in your co-facilitator's guide). Practice the demonstration at least once before performing in front of the group.

Introduce the role play by telling the students that you are going to demonstrate teaching a mother to give an oral drug at home. Ask students to observe the demonstration and to look for:

- * the steps to follow when giving oral drugs to the mother of a sick child, and
- * whether good communication skills were used while teaching the mother to give the drugs at home.

After the demonstration, lead a group discussion. Ask students to read the general steps listed in the upper left of the box titled, "Teach the Mother to Give Oral Drugs at Home." Point out that these steps were followed in the demonstration.

Ask a participant to list the basic teaching steps that they have already read. Their list should include:

- * giving information,
- * showing the mother an **example** (by demonstrating how to measure a dose),
- * letting the mother **practice**, and
- * **checking the mother's understanding.**

A physician should ask good checking questions and then praise the mother when she answers a checking question correctly.

SCRIPT FOR DEMONSTRATION ROLE PLAY

- Physician: Now I am going to teach you how to give this drug to Gita. This is cotrimoxazole which is an antibiotic. She needs to take this drug to treat her umbilical infection. Are you the person who will give the drug to Gita?
- Mother: Yes, I am.
- Physician: Good. I will show you how much to give her. Since Gita is a baby, 1 month old, she needs to take just one-half of one of these tablets at a time.
(Holds up one cotrimoxazole tablet.)
You will have to break the tablet in half, like this *(breaks tablet in fingers)* or you can cut it in half with a knife. *(Holds up half tablet.)*
This half is one dose. Now you try it. *(Hands a tablet to the mother.)*
- Mother: Yes, I will try. *(Mother struggles a bit but breaks the tablet in half.)*
- Physician: Good, you did it. Now, how much is one dose for Gita?
- Mother: *(Mother holds up the half tablet.)* This much.
- Physician: That's correct. Now you are going to give the tablet to Gita. Have you ever given tablets to Gita before?
- Mother: No. She has never been sick before.
- Physician: Ah. To give a tablet, you will have to make it so the baby can swallow it. You should crush it or grind it until it is in very small pieces, and then mix it with a little breastmilk. Here is a cup and spoon for you to use. *(Hands mother a cup and spoon)* Put the dose into the cup and.....
- Mother: Do that now?
- Physician: Yes, now. I would like you to prepare a dose and give it to Gita now. *(Mother nods.)* Put the half tablet into the cup and crush it with the spoon.

(Mother begins crushing the tablet. Physician watches her and looks into the cup to see when it is crushed.)

That's correct. Now add a **little** breast milk and mix it in.

Mother: *(Mother mixes turns around and expresses her breast milk into the cup with the crushed tablet. She shows the cup to the physician).* Is it OK?

Physician: Yes, that looks ready. Now, with the spoon, try to put the medicine into Gita's mouth.

Mother: I'll try. *(She spoons it into the baby's mouth.)* She doesn't like it. What should I do?

Physician: You are doing fine. See, she is swallowing it now. At home, try mixing it with more breast milk.

Mother: I will.

Physician: You need to give a dose to Gita two times each day, once in the morning, such as at breakfast, and again at dinner. I am giving you enough tablets for 5 days.
(Physician writes the instructions on the envelope and then puts 5 tablets into the envelope. He closes the envelope and the jar of cotrimoxazole. He hands the envelope to the mother so that she can see the instructions.)

Mother: Thank you.

Physician: I have written the instructions on the envelope to remind you when to give the medicine. Would you read me the instructions on the envelope?

Mother: *(Looking at envelope)* What is this picture?

Physician: That is a picture of the sun rising. The round sun represents midday, the next picture is sunset....

Mother: Yes, of course. I see now. *(Mother tries unsuccessfully to read the instructions on the envelope.)*

Physician: *(Reads the instructions on the envelope to the mother.)* Who can help you read the envelope?

Mother: My sister can read. She lives with us.

Physician: Good. I want to tell you another important thing -- continue giving Gita the medicine in this envelope until it is all gone. Even if she seems to be better, she needs to take **all** the tablets to be sure that she will get well and stay well.

Mother: I can do that.

Physician: Good. And how much will you give Gita each time?

Mother: I will give her one-half tablet.

Physician: Correct. And how will you prepare it?

Mother: I will crush it and add a little breast milk.

Physician: Good. Can you tell me how many times each day you will give Gita a dose of the medicine?

Mother: I will give the medicine at sunrise and at sunset.

Physician: That's correct. Twice each day. I want you to bring Gita back to see me in 2 days, so that I can be sure she is getting better.

Mother: When is that?

Physician: The day after tomorrow. Will you, or someone else in your family, be able to bring Gita back?

Mother: Yes, I can bring Gita back the day after tomorrow.

Physician: Good, I will expect you then.

Mother: *(Gathering up her things and Gita and leaving)* Thank you.

Physician: Good bye.

7	Students read page 42 through 47	Self reading	15 Min
8	Helping positioning for breast feeding	Video: Demonstration	10 Min

Video demonstration of how to teach correct positioning and attachment for breastfeeding

When all the participants are ready, arrange for them to move to where the video will be shown. Make sure they bring their modules.

If it is possible in the room where the video is shown, display the enlargement of "Teach Correct Positioning and Attachment for Breastfeeding."

To show the video demonstration:

1. Tell participants that they will watch a demonstration of helping a mother to improve positioning and attachment for breastfeeding.
2. Ask if participants have any questions before you start the video. When there are no additional questions, start the video.
3. At the end of the video, lead a short discussion. Ask participants to look at the box, "Teach Correct Positioning and Attachment for Breastfeeding." Explain that the video showed exactly these steps. Then make the following points:
 - * Good positioning is important for good attachment. A baby who is well positioned can take a good mouthful of breast.
 - * Review the four steps to help her position the infant. (As you speak, point to the steps on the enlargement.)
 - * When you explain to a mother how to position and attach her infant, let her do as much as possible herself.
 - * Then review the 3 steps to help the infant to attach.
 - * Check for signs of good attachment and effective suckling. It may take several attempts before the mother and baby are able to achieve good attachment.

If participants are not clear about the steps, rewind the tape and show it again.

9	Home visits for newborns. Only for those involved with conducting or supervising home visits	Gp Discussion	20 min
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Home Visits For Young Infants

Tell the participants that they can play an important role in improving the newborn care in their area by educating the community and counselling the mother about home care of a young infant and children. This is possible only if home visits are conducted and families provided guidance in looking after these young infants.

Keep track of all births in the area so that they learn about a birth within 24 hours. Perform the first home visit at the earliest, preferably on the day of birth. Before going for the home visit, ensure that they have the following with them:

- Weighing scale (use the one available at the Anganwadi)
- Chart book
- Recording form and a pen

At the first visit, perform the following tasks:

Greet the family and ask the mother if she and her baby are well

When you see the mother and her newborn infant, introduce yourself to the family and greet them appropriately. Ask if the newborn is well to open a dialog with the family.

If the mother is unable to answer because she is in pain or is tired or sleepy, ask another family member who is taking care of the baby.

Communicate the purpose of home visits to the mother and the family

Tell the family that the purpose of your visit is to help them provide essential newborn care to keep the baby healthy and growing well. Explain to them that this is possible through exclusive breastfeeding, keeping the baby warm, taking care of the cord and early recognition and treatment of any illness. Tell the family that you will check if the baby is well. Also inform the family that you will visit again several times over the next 4 weeks.

Check for signs of Possible Bacterial Infection

Use the ASSESS AND CLASSIFY THE YOUNG INFANT chart as you have learnt earlier.

Ask if the newborn has diarrhoea

Diarrhoea is not a problem in the first week of life. If the mother says that her baby has diarrhoea, reassure her. (At home visits after 1 week of age, assess and classify for diarrhoea if the mother says that the young infant has diarrhoea.)

Check for feeding problem

Use the ASSESS AND CLASSIFY THE YOUNG INFANT chart as you have learnt earlier.

Record weight and decide the schedule of subsequent home visits

The schedule of subsequent visits is based on birth weight. The recommended schedule for home visits is outlined below:

All babies	3, 7 days
Low birth weight babies (weight less than 2.5 kg)	3, 7, 14, 21 and 28 days

Advise the mother and the family on home care

Exclusive breastfeeding

Ask the mother if she has already put the infant to the breast. If the mother has already started breastfeeding, praise the mother for starting the breastfeeding in time. If the mother has not yet started breast-feeding, prepare her to put the infant to the breast. Talk to the mother to answer any questions about breastfeeding that she may have.

Emphasize the importance of exclusive breastfeeding and counsel her against giving any other foods or fluids other than breast milk. Remember to tell her that no extra water is required for an exclusively breast-fed baby even if in hot weather. There is always enough water in breast milk to protect the baby from getting dehydrated.

How to keep the baby warm

As in the TREAT THE YOUNG INFANT AND COUNSEL THE MOTHER chart.

When to seek care

As in TREAT THE YOUNG INFANT AND COUNSEL THE MOTHER chart.

Advise the mother and the family on newborn care practices

Umbilical cord care

Check if the cord is oozing blood because it has not been tied properly. If not tied properly, tie it again with a thread that has been boiled in water for at least 15 minutes. See if anything has been applied to the cord. If nothing has been applied, praise the mother and the family. Otherwise emphasize the importance of not applying anything on the cord and keeping the cord dry.

Bathing the infant

While the baby needs to be kept clean, discourage the mother from giving bath to the baby during the first day after birth. The mother or the birth attendant can clean the baby by wiping with a soft moist cloth. When the baby is given a bath, bathing should be done quickly in a warm room, using warm water.

Low birth weight infants should not be given a bath. Instead, clean the baby with a soft, clean cloth soaked in lukewarm water.

Hand washing

The mother should wash hands with soap and water after cleaning the baby every time it passes stools.

<p>Remember to take the opportunity at every home visit to check and advise the mother about her own health</p>
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Before you leave the house, tell the family that you will visit again as per schedule. However, the family can contact you for help in case they think the young infant has a problem.

SUBSEQUENT HOME VISITS

Follow the instructions given above for the first home visit at the subsequent visits also.

There is no need to take weight at these visits if the infant is well and is not low birth weight.

At the last scheduled home visit, ensure that you advise the mother to continue exclusive breastfeeding up to 6 months and go for BCG, DPT, OPV and Hepatitis B immunization at 6 weeks of age.

10	Role Play Home Visit	Role play	30 min
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Role Play on Home Visit

There are 2 role plays to be conducted by the participants

*This exercise allows participants to practice the **entire** process covered in conducting the Home Visits using the charts. Participants do the whole process using good communication skills and using the Assessment Charts.*

Highlights of role play 1, Rekha: *6-hour-old baby who is low weight has still not been put to breasts but has been given pre lacteal feeds. Health worker must explain early initiation of breast feeding and home care of a baby with low weight. This includes:*

1. Advise mother how to keep the young infant with low weight or low body temperature warm at home
2. Breastfeed frequently and for as long as the infant wants, day or night, during sickness and health
3. When to seek care for illness

Highlights of role play 2, Barkha: *7-day-old baby has normal weight and has a skin infection. Mother is worried about transitional stools. Health worker must explain how to treat local infection and reassure the mother.*

Assign roles and conduct the role plays as follows:

1. Assign the role of health worker in each role play to a different participant. Encourage these participants to take several minutes to review the relevant assessment chart. Tell them they should be prepared for the mother to behave like a real mother, to ask questions, etc.
2. Assign the role of the mother in each role play to a different participant. (If there are not enough women, men can play the role of mothers.) Give each mother a slip of paper describing the situation, and her attitude. These slips of paper are provided below and on the next page of this guide and may be photocopied or cut out. Tell the "mothers" that they may make up additional realistic information that fits the situation if necessary. Help them prepare to play the role.
3. Conduct each role play. During the role play, observers should complete the sections of the assessment charts printed in the module. They should be prepared to answer and discuss the questions given in the module.
4. After each role play, lead a brief discussion. Ensure that positive comments are made as well as suggestions for improvements. *(Note: If the health worker in the first role play does not properly explain the recommendations for initiation of exclusive breast feeding, be sure to explain them in this discussion.)*

Role Play 1 - Description for the Mother

You are the mother of Rekha, a 6-hour-old boy who has low weight and has not been started on breast feeding. Now the health worker is going to ask you some questions, assess your baby and advise you about home care and when to seek care for illness.

You are worried about Rekha, but you have little milk in your breasts. You are timid when talking with the health worker, and you are hesitant to ask questions, even when you are confused. You tend to answer the health worker very briefly so that he or she must ask further questions to get the necessary information.

Rekha has not been given breast milk but your mother in law has given some Honey. *If the health worker advise you about breast feeding convey your custom that breastfeeding is started only after the arrival of the aunt(your husband's sister) and she is expected today evening.*

Role Play 2 - Description for the Mother

You are the mother of Barkha, an 8-days-old girl who has normal weight and has skin pustules. You are worried that child passes several stools in a day after every feed but the stools do not have separate water. Now the health worker is going to advice you the treatment of skin infection.

You are worried about Barkha and want some medicine for loose stools. You tend to answer the health worker very briefly so that he or she must ask further questions to get the necessary information.

11	Home care for young infant	Drill	10 Min
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DRILL: Review of points of Advice for Mothers of Young Infants

Conduct this drill at a convenient time after this point in the module. If possible, do the drill before the participants go to the last clinical session which should include counseling for mothers of young infants.

Tell the participants that in this drill, they will review important points of advice for mothers of infants, including

- improving positioning and attachment for breastfeeding
- home care.

They may look at the *YOUNG INFANT* chart if needed, but should try to learn these points so they can recall them from memory.

Ask the question in the left column. Participants should answer in turn. When a question has several points in the answer, you may ask each participant to give one point of the answer. This will move along smoothly and quickly if participants are setting in a circle or semi-circle and they reply in order.

QUESTIONS	ANSWERS
When advising a mother about Home Care for a young infant, what are the five major points of advice?	Breastfeed frequently Make sure the young infant stays warm Hand washing Not to apply anything on the cord When to return
What is the advice to give about breastfeeding?	<ul style="list-style-type: none"> - Breastfeed frequently, as often and for as long as the infant wants, day and night, during sickness and health. - Exclusive breastfeeding is best. - Do not use a bottle.
What are the signs to teach a mother to return immediately with the young infant?	Return immediately with the infant if: <ul style="list-style-type: none"> - Breastfeeding or drinking poorly - Becomes sicker - Develops a fever - Fast breathing - Difficult breathing - Blood in stool
What is another reason that a mother may return with the young infant?	Return for a follow-up visit as scheduled. Return for immunization.
If a young infant has a feeding problem, when should the mother bring him back for follow-up?	In 2 days
What advice would you give about keeping the infant warm?	In cool weather, cover the infant's head and feet and dress the infant with extra clothing.
What are the four signs of good attachment?	Chin touching breast Mouth wide open Lower lip turned outward More areola visible above than below the mouth
Describe effective suckling.	The infant takes slow, deep sucks, sometimes pausing.
When you help a mother hold and position her infant for breastfeeding, what are 4 points to show her?	Show her how to hold the infant <ul style="list-style-type: none"> - with the infant's head and body straight - facing her breast, with infant's nose opposite her nipple - with infant's body close to her body - supporting infant's whole body, not just neck and shoulders
When the infant has attached, what	Look for the signs of good attachment

should you do?	and effective suckling.
Again, what are the signs of good attachment?	Chin touching breast Mouth wide open Lower lip turned outward More areola visible above the mouth than below
If attachment or suckling is not good, what should you do?	Ask the mother to take the infant off the breast. Help the mother position and attach the infant again.

DAY 6: LIST OF ACTIVITIES: CLINICAL SESSION

Assess, classify and treat the sick young infant.	Demonstration
Allocation of cases to students	Observation and feedback

To Prepare	<ul style="list-style-type: none"> -Ask participants to bring chart booklet, pencils, timing devices. -Bring 2 Recording Forms per participant. -Place tablets or syrup, drug label, envelope or paper to wrap tablets on table or tray.
Participant Objectives	<ul style="list-style-type: none"> -Assess and classify a sick Young Infant ; practice identifying the Young Infant's treatment. -Counsel mother for any breast feeding problem. -Advise mothers when to return immediately. -Teach mother to give her child an oral drug at home. -Use a Mother's Card to advise and teach mothers. -Use good communication skills.
Facilitator Procedures	<p>Choose sick Young Infants with any symptoms.</p> <ol style="list-style-type: none"> 1 .Assess and classify a Young Infant and, using chart or chart booklet and a Recording Form, demonstrate how to identify the Young Infant 's treatment. 2. Demonstrate how to advise mother when to return immediately. Use the relevant part of the Mother's Card. 3. Review steps on chart and demonstrate how to teach mother to give an oral drug at home. 4. Assign patients to participants. 5. Supervise participants carefully as they practice 3 new steps: identifying treatment, advising when to return immediately and giving oral drugs. 6. Give feedback and guidance as needed. 7. Return Young Infant to clinic with note for treatment.
At the end of the session	<ol style="list-style-type: none"> 1. Lead discussion to summarize session and give feedback on skills practiced and demonstrated today. 2. Discuss problems with compliance and words that mothers understand for: becomes sicker, develops a fever, drinking poorly, tablet, syrup. 3. Remind participants to keep their Recording Forms. 4. Complete Monitoring Checklist.

DAY 7 : LIST OF ACTIVITIES

S NO	Task	Method	Time
1	Students read pages 48 through 54	Self reading	20 Min
2	Conduct video demonstration and exercise on assessment the child age 2 months to 5 years for general danger signs, cough or difficult breathing	Video	30 Min
3	Students read pages 55 through 60	Self reading	20 Min
4	Photograph exercise	Group discussion	20 Min
5	Conduct video demonstration and exercise on assessment the child age 2 months to 5 years for diarrhoea	Video	30 Min

1	Students read pages 48 through 54	Self reading	20 Min
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2	Conduct video demonstration and exercise on assessment the child age 2 months to 5 years for general danger signs, cough or difficult breathing	Video	30 Min
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Video exercise -- "Check for general danger signs" and "Does the child have cough or difficult breathing ?"

To conduct this video exercise:

1. Introduce participants to the procedure for video exercises in this course. Explain that during video exercises they will:
 - * see videotaped demonstrations and exercises
 - * do exercises and record their answers on worksheets in the module
 - * check their own answers to exercises and case studies with those on the video.

2. Tell participants that in the first part of the video for Exercise A they will see examples of general danger signs. They will see:

- * a child who is not able to drink or breastfeed,
- * a child who is vomiting,
- * a mother who is being asked about her child's convulsions, and
- * a child who is lethargic or unconscious.

Then participants will do an exercise to practice deciding if the general danger sign "lethargic or unconscious" is present in each child.

3. Start the videotape. If they are not writing answers on the worksheets in their modules, encourage them to do so. If they seem to be having difficulty, replay the exercise so they can see the exercise again, develop an answer and write it on the worksheet.

4. At the end of the exercise, stop the machine. Ask if any participant had problems identifying the sign "lethargic or unconscious". Rewind the tape to replay any exercise item or demonstration that you think participants should see again. Emphasize points such as:

- * Notice that a child who is lethargic may have his eyes open but is not alert or paying attention to what is happening around him.
- * Some normal young children sleep very soundly and need considerable shaking or a loud noise to wake them. When they are awake, however, they are alert.

Answers to Exercise A

1. For each of the children shown, answer the question:

	Is the child lethargic or unconscious ?	
	YES	NO
Child 1		✓
Child 2	✓	
Child 3		✓
Child 4	✓	

Conduct Video Exercise – ‘Child with Cough or Difficult Breathing’

Tell the participants that they will now:

- in
- ⇒ see a demonstration of how to count the number of a child’s breaths
one minute
 - ⇒ practice counting the number of breaths a child takes in one
minute and decide if fast breathing is present;
 - ⇒ see examples of looking for chest in drawing ; and, Fast Breathing
 - ⇒ do a case study and practice assessing and classifying a sick child
up through cough or difficult breathing.

Start the videotape and show the demonstration, exercises and case study for cough or difficult breathing. If any participant has difficulty seeing the child’s breaths or counting them correctly, rewind the tape to that particular case and repeat the example. Show the participant where to look for and count the breaths again.

Chest Indrawing

Note: Chest indrawing may be a difficult sign for participants to identify the first time. It may take several trials for the participant to feel comfortable with this sign.

- ⇒ If any participant has difficulty in identifying chest indrawing, repeat an example from the video. Talk through with the participant where to look for chest indrawing, pointing to where the chest wall goes in when the child breathes in.
- ⇒ Some participants may need help determining when the child is breathing IN. Show an example from the video. Point to where on the child’s chest the participant should be looking. Each time the child breaths in, say “IN” to help the participant see clearly where to look and what to look for.
- ⇒ It may be helpful to pause the video and ask a participant to point to the place where he would look for chest indrawing. This will help you to check if participants are looking at the appropriate place for identifying chest indrawing. Repeat the exercises on the video until you

feel confident that the participants understand where to look for chest indrawing and can identify the sign in each child shown in this exercise.

For each of the children shown in the video, answer the question:

			Does the child have fast breathing?	
	Age	Breaths per minute	YES	NO
Mano	4 years	65	✓	
Wambai	6 months	66	✓	

For each of the children shown in the video, answer the questions:	Does the child have chest indrawing?	
	YES	NO
Mary		✓
Jenna	✓	
Ho	✓	
Anna		✓
Lo		✓

	Does the child have stridor?	
	YES	NO
Petty	✓	
Helen	✓	
Simbu		✓
Hassan		✓

Video Case Study

MANAGEMENT OF THE SICK CHILD AGE 2 MONTHS UP TO 5 YEARS	
Name: <u>BEN</u> Age: <u>7</u> months Weight: <u>6</u> kg Temperature: <u>38.5</u> °C	
ASK: What are the child's problems? <u>cough for 2 weeks</u> Initial visit? <input checked="" type="checkbox"/> Follow-up Visit? <input type="checkbox"/>	
ASSESS (Circle all signs present)	CLASSIFY
CHECK FOR GENERAL DANGER SIGNS NOT ABLE TO DRINK OR BREASTFEED LETHARGIC OR UNCONSCIOUS VOMITS EVERYTHING CONVULSIONS	General danger signs present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> Remember to use danger sign when selecting classifications
DOES THE CHILD HAVE COUGH OR DIFFICULT BREATHING? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> <ul style="list-style-type: none"> • For how long? <u>14</u> Days • Count the breaths in one minute. <u>55</u> breaths per minute. Fast breathing? • Look for chest indrawing. • Look and listen for stridor. 	SEVERE PNEUMONIA or VERY SEVERE DISEASE

3	Students read pages 55 through 60	Self reading	20 Min
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4	Photograph exercise	Group discussion	20 Min
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Photograph exercise -- Group work with group feedback -- Practice identifying signs of dehydration in children with diarrhoea.

Note: Participants are not expected to prepare complete descriptions for signs in these photographs. They only need to decide if the sign asked for in each exercise item is present. If you see that a participant is writing a lengthy formal description of the photograph, reassure him that he only needs to answer the question in the module.

Photographs 30 and 31:

Talk through the example photographs with your group of participants. Explain particular points such as:

Photograph 30: This child's eyes are sunken.

Photograph 31: This child has a very slow skin pinch.

Photographs 32 through 36:

Photograph 32: This child has sunken eyes.

Photograph 33: The child has sunken eyes.

Photograph 34: The child does not have sunken eyes.

Photograph 35: The child has sunken eyes.

Photograph 36: The child's skin pinch goes back very slowly.

5	Conduct video demonstration and exercise on assessment the child age 2 months to 5 years for diarrhoea	Video	30 Min
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**Video exercise and case study --
"Does the child have diarrhoea?"**

1. Tell participants that in this video exercise, they will:
 - * See examples of children with diarrhoea who have the signs of dehydration.
 - * Watch a demonstration of a diarrhoea assessment and how to classify dehydration.
 - * Do an exercise to practice recognizing sunken eyes and slow or very slow skin pinch.
2. Explain that the participants should write answers to the exercises and case study . They check their answers with those provided on the video.
3. At the end of each exercise, stop the machine. If participants are having trouble identifying a particular sign, rewind the tape and show the exercise item again. Talk through the exercise item and show the participants where to look to recognize the sign.

At the end of the video, conduct a short discussion. If participants had any particular difficulty, provide guidance as needed. Emphasize points during the discussion such as:

- * If you can see the tented skin even briefly after you release the skin, this is a slow skin pinch. A skin pinch which returns immediately is so quick that you cannot see the tented skin at all after releasing it.

- * Repeat the skin pinch if you are not sure. Make sure you are doing it in the right position.
- * Sometimes children who are sick or tired hold very still in clinic but they respond to touch or voice. Josh is an example of this. They should not be considered lethargic. It can be hard to tell this on the video because you only see a few minutes of the child. If you initially think a child is lethargic but then he awakens and becomes alert later in the examination, do not consider this child to have the general danger sign "lethargic or unconscious"

Answers to Exercise E

1. For each of the children shown, answer the question:

	Does the child have sunken eyes ?	
	YES	NO
Child 1	✓	
Child 2		✓
Child 3	✓	
Child 4		✓
Child 5	✓	
Child 6		✓

2. For each of the children shown, answer the question:

	Does the skin pinch go back:		
	very slowly ?	slowly ?	immediately ?
Child 1		✓	
Child 2			✓
Child 3	✓		
Child 4		✓	
Child 5	✓		

Video Case Study:

MANAGEMENT OF THE SICK CHILD AGE 2 MONTHS UP TO 5 YEARS

Name: JOSH Age: 6 MONTHS Weight: 6 kg Temperature: 38 °C

ASK: What are the child's problems? DIARRHOEA Initial visit? Follow-up Visit?

ASSESS (Circle all signs present)

CLASSIFY

CHECK FOR GENERAL DANGER SIGNS

General danger signs present?

NOT ABLE TO DRINK OR BREASTFEED
VOMITS EVERYTHING
CONVULSIONS

LETHARGIC OR UNCONSCIOUS

Yes No
Remember to use danger sign when selecting classifications

DOES THE CHILD HAVE COUGH OR DIFFICULT BREATHING?

Yes No

• For how long? 3 Days

- Count the breaths in one minute. 56 breaths per minute. Fast breathing?
- Look for chest indrawing.
- Look and listen for stridor.

PNEUMONIA

DOES THE CHILD HAVE DIARRHOEA?

Yes No

- For how long? 5 Days
- Is there blood in the stools?

- Look at the child's general condition. Is the child:
Lethargic or unconscious?
~~Restless and/or irritable?~~
- Look for sunken eyes.
- Offer the child fluid. Is the child:
Not able to drink or drinking poorly?
Drinking eagerly, thirsty?
- Pinch the skin of the abdomen. Does it go back:
Very slowly (longer than 2 seconds)?
Slowly?

SEVERE DEHYDRATION

DAY 8: LIST OF ACTIVITIES

CLINICAL SESSION

Assess and classify the child age 2 months to 5 years for general danger signs, cough or difficult breathing and diarrhoea	Demonstration
Allocation of cases to students	Observation and feedback

CLINICAL SESSION

Management of the Sick Child:

General Danger Signs - Cough or Difficult Breathing Diarrhoea

To Prepare	<ul style="list-style-type: none"> - Ask participants to bring their chart booklets. - Bring 2 copies of Recording Form per participant. - Make sure the following are available in each room where participants are working: cup or spoon and clean water for offering fluid to assess dehydration.
Participant Objectives	<ul style="list-style-type: none"> - Check for general danger signs. - Assess and classify sick children for cough or difficult breathing through Diarrhoea. - Practice using Recording Form in outpatient setting. - Use good communication skills
Facilitator Procedures	<p>Choose children with diarrhoea or with cough or difficult breathing and any child with a general danger sign.</p> <ol style="list-style-type: none"> 1. Introduce clinic facility and staff, describe general procedures for outpatient sessions, and show where supplies are located. 2. Demonstrate how to check for general danger signs and how to assess and classify child for cough or difficult breathing also demonstrate how to assess child for diarrhoea. (Preferably, do this demonstration with a child who is dehydrated.) Demonstrate technique for doing skin pinch. 3. Assign patients to participants. 4. Supervise closely first time participant counts child's breaths, looks for chest indrawing and listens for stridor, also observe closely first time participant assesses a child with diarrhoea to be sure assessment

	<p>is done correctly (especially skin pinch). Observe each participant as he works with a patient. If you cannot observe, ask participant to present case or look at participant's Recording Form. Record case on Monitoring Checklist, if possible.</p> <p>6. If child with SOME DEHYDRATION or SEVERE DEHYDRATION presents during session, demonstrate signs to all participants.</p> <p>7. Give feedback and guidance as needed. . Return patient to clinic staff with note for treatment, or treat according to arrangements.</p>
At the end of the session:	<ol style="list-style-type: none"> 1. Lead discussion to summarize session and give feedback on skills practiced today. 2. Discuss words mothers understand for: convulsions, difficult breathing, fast breathing, pneumonia, diarrhoea, blood in the stool.. 3. Tell participants to keep their Recording Forms to use when they return to the classroom. 4. Complete the Monitoring Checklist.

SPECIAL NOTES FOR CLINICAL SESSION

Demonstration:

Tell participants the objectives for today's session. Also review the following phrases that describe age groups in this course:

- "2 months up to 5 years" refers to children who are at least 2 months old and also any age between 2 months and 5 years of age. It does not include the child who is already 5 years old.
- "2 months up to 12 months" includes children who are at least 2 months old and any age between 2 months and 12 months. It does not include a child who is already 12 months old.
- "12 months up to 5 years" includes children who are at least 12 months old and any age between 12 months and 5 years. It does not include a child who is already 5 years old.

Review the cut-offs for determining fast breathing. Ask several participants in turn to tell you the definition of fast breathing in a child who is:

- at least 2 months of age up to 12 months of age
ANSWER: 50 breaths per minute or more

- 12 months up to 5 years of age
ANSWER: 40 breaths per minute or more.

- exactly 12 months old
ANSWER: 40 breaths per minute or more.

- * Do the demonstration. Make sure participants know where to look in their chart booklets for the *ASSESS & CLASSIFY* boxes that describe how to check for general danger signs and how to assess and classify cough or difficult breathing.
- * Ask participants to tell you if they identify a child with a general danger sign so you can alert the regular clinic staff.

Supervision and feedback:

Watch each participant while he counts the number of breaths, looks for chest indrawing and listens for stridor. If a participant's count is too high or too low, or if he had difficulty identifying chest indrawing or stridor, give him guidance based on your observation of his work. For example, you may have noticed that the participant did not time one minute correctly and needs instruction on how to time a minute. Or you may ask him about how he counted (for example, where he was watching for movement) and suggest how to do it better. If there are errors, ask the participant to do the step again.

DAY 9: LIST OF ACTIVITIES

S NO	Task	Method	Time
1	Students read pages 61 through 67	Self reading	30 Min
2	Classification of a child with fever	Demonstration	15 Min
3	Photograph exercise	Group work	20 Min
4	Fever: Video Exercise	Video	30 Min
5	Students read pages 68 through 80	Self reading	30 Min
6	Photograph exercise	Group work	20 Min

1	Students read pages 61 through 67	Self reading	30 Min
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2	Classification of a child with fever	Demonstration	15 Min
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Practice classifying sick children up through fever.

Classifying fever involves selecting the appropriate classification table. This is slightly different from the system participants have learned so far. Make sure that participants use the correct classification table when answering the case studies for this exercise. Participants should only practice classifying fever according to the classification table for low malaria risk if there is low malaria risk in their clinic's area.

Materials needed:

- * Enlargement of Blank Recording Form
- * Enlargement of Classification Table - Fever (High Malaria Risk)
- * Enlargement of Classification Table - Measles

To conduct the group discussion:

Review with participants how to assess a child with fever. Review the assessment steps and how to do them. Emphasize that you do the assessment steps below the broken line only if the child has signs of measles (generalized rash and one of these: cough, runny nose, or red eyes) or has had measles within the last 3 months.

- * Review briefly with participants the step, "Decide malaria risk." Point out that to select the correct classification table, you need to know the malaria risk. Talk through with participants whether the malaria risk in their clinic's area is high or low. Is the malaria risk high all year long? Or is the malaria risk high only during certain seasons? Helping participants to clarify the

risk of malaria in their clinic's area will guide them in whether they should read or skip the information later in this section about classifying fever when the risk of malaria is low.

- * Explain that participants can circle on the recording form how they decided to assess the child for fever. They can circle the appropriate phrase -- by history/feels hot/temperature 37.5°C or above -- that follows the question, "Does the child have fever?"

3	Photograph exercise	Group work	20 Min
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Photographs

Photographs 37 through 40:

Photograph 37: This child has the generalized rash of measles and red eyes. You can see that the rash has spread to the child's face and chest. The measles rash does not have vesicles or pustules.

Photograph 38: This child has a heat rash. Heat rash can be generalized with small bumps and vesicles which itch. The child's rash is not red.

Photograph 39: This child has scabies. This is not a generalized rash. There are vesicles present and open "runny" sores.

Photograph 40: This child's rash is due to chicken pox. It is not a generalized rash of measles.

Now look at Photograph 41. Does this child have a measles rash ?

	Is the generalized rash of measles present ?	
	YES	NO
Photograph 41	✓	
Photograph 42		✓ <i>This child has scabies.</i>
Photograph 43	✓	
Photograph 44		✓ <i>This child has scabies.</i>
Photograph 45		✓ <i>This child has tinea versicolor.</i>
Photograph 46		✓ <i>This child has chicken pox.</i>
Photograph 47		✓ <i>This child is malnourished and has</i>
Photograph 48		✓ <i>This child has heat rash.</i>
Photograph 49	✓	
Photograph 50		✓ <i>This child has normal skin.</i>

- Photograph 51: This is an example of a normal mouth. The child does not have mouth ulcers.
- Photograph 52: This child has Koplik spots. These spots occur in the mouth inside the cheek early in a measles infection. They are not mouth ulcers.
- Photograph 53: This child has measles with mouth ulcers. In this photograph, we can only see the ulcers on the lips.

	Does the child have mouth ulcers ?	
	YES	NO
Photograph 54	✓	
Photograph 55	✓	
Photograph 56		✓

Photograph 57: This is a normal eye showing the iris, pupil, conjunctiva and cornea. (Make sure participants understand the terms *iris*, *pupil*, *conjunctiva* and *cornea*.) There is no pus. There are tears. The child has been crying. There is no pus draining from the eye.

Photograph 58: This child has pus draining from the eye.

Photograph 59: This child has clouding of the cornea.

	Does the child have:	
	Pus draining from the eye ?	Clouding of the cornea ?
Photograph 60	yes	Not able to tell
Photograph 61	no	no
Photograph 62	yes	Not able to tell
Photograph 63	no	yes
Photograph 64	no	yes
Photograph 65	yes	Not able to tell
Photograph 66	no	no

4	Fever: Video Exercise	Video	30 Min
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Video exercise -- "Does the child have fever ?"

When all the participants are ready, arrange for them to move to where the video exercise will be shown. Make sure they bring their modules.

To conduct the video exercise:

1. Tell participants that during the video for Exercise J they will see examples of how to assess a child with fever for:
 - stiff neck
 - generalized rash of measles

They will also see how to assess children with measles for:

- mouth ulcers
- pus draining from the eye
- clouding of the cornea

They will do an exercise to practice identifying whether stiff neck is present and do a case study to practice assessing and classifying a sick child up through fever.

2. Ask if participants have any questions before you start the video. When there are no additional questions, start the video.
3. At the end of the video presentation, lead a short discussion. Answer any questions that participants might have about identifying and classifying clinical signs in children with fever. If they had any particular difficulty identifying or classifying signs during the case study, rewind the tape and show especially clear examples that demonstrate the sign effectively for the participant.

Important points to emphasize in this video are:

- * The video shows examples of measles rash at different stages: the early red rash and the older rash which is peeling as you saw in Pu's case.
- Assessing for stiff neck varies depending on the state of the child. You may not need to even touch the child. If the child is alert and calm, you may be able to attract his attention and cause him to look down. If you need to try to move the child's neck, you saw in the video a position which supports the child while gently bending the neck. It is hard to tell from a video whether the child's neck is stiff. When you do this step with a real child, you will feel the stiffness when you try to bend the neck. You also saw the child cry from pain as the doctor tried to bend the neck.

For each of the children shown, answer the question:

	Does the child have a stiff neck ?	
	YES	NO
Child 1		✓
Child 2	✓	
Child 3		✓
Child 4	✓	

Video Case Study:

MANAGEMENT OF THE SICK CHILD AGE 2 MONTHS UP TO 5 YEARS

Name: PU Age: 4 YEARS , 9 MONTHS Weight: 14 kg Temperature: 38 °C

ASK: What are the child's problems? RASH, FEVER Initial visit? ✓ Follow-up Visit?

ASSESS (Circle all signs present)

CLASSIFY

CHECK FOR GENERAL DANGER SIGNS		General danger signs present?
NOT ABLE TO DRINK OR BREASTFEED VOMITS EVERYTHING CONVULSIONS	LETHARGIC OR UNCONSCIOUS	Yes ___ No <u>✓</u> Remember to use danger sign when selecting classifications
DOES THE CHILD HAVE COUGH OR DIFFICULT BREATHING? Yes <u>✓</u> No ___ • For how long? <u>7</u> Days • Count the breaths in one minute. <u>44</u> breaths per minute <u>Fast</u> breathing? • Look for chest indrawing. • Look and listen for stridor.		PNEUMONIA
DOES THE CHILD HAVE DIARRHOEA? Yes ___ No <u>✓</u> • For how long? ___ Days • Is there blood in the stools? • Look at the child's general condition. Is the child: Lethargic or unconscious? Restless and/or irritable? • Look for sunken eyes. • Offer the child fluid. Is the child: Not able to drink or drinking poorly? Drinking eagerly, thirsty? • Pinch the skin of the abdomen. Does it go back: Very slowly (longer than 2 seconds)? Slowly?		
DOES THE CHILD HAVE FEVER? (by history/feels hot/temperature <u>37.5°C</u> or above) Yes <u>✓</u> No ___ • Decide Malaria Risk: <u>High</u> Low • For how long? <u>3</u> Days • If more than 7 days, has fever been present every day? • Has child had measles within the last three months?		MALARIA
Does the child have measles now or within the last 3 months?: • Look for mouth ulcers. If Yes, are they deep and extensive? • Look for pus draining from the eye. • Look for clouding of the cornea.		MEASLES WITH EYE OR MOUTH COMPLICATIONS

5	Students read pages 68 through 80	Self reading	30 Min
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6	Photograph exercise	Group work	20 Min
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Photograph 67: This is an example of visible severe wasting. The child has small hips, thin legs relative to the abdomen. There is still cheek fat on the child's face.

Photograph 68: This is the same child as in photograph 67 showing loss of buttock fat.

Photograph 69: This is the same child as in photograph 67 showing folds of skin ("baggy pants") due to loss of buttock fat. Not all children with visible severe wasting have this sign. It is an extreme sign.

Photograph 70: This child has oedema. *Notice that the child has oedema of both feet. In this child, the oedema extends up to the child's legs.*

	Does the child have visible severe wasting ?	
	YES	NO
Photograph 71		✓
Photograph 72	✓	
Photograph 73		✓
Photograph 74	✓	
Photograph 75	✓	
Photograph 76	✓	
Photograph 77		✓
Photograph 78	✓	
	Does the child have oedema ?	
	Yes	No
Photograph 79	✓	

Photograph 80: This child's skin is normal. There is no palmar

pallor.

Photograph 81a: The hands in this photograph are from two different children. The child on the left has some palmar pallor.

Photograph 81b: The child on the right has no palmar pallor.

Photograph 82a: The hands in this photograph are from two different children. The child on the left has no palmar pallor.

Photograph 82b: The child on the right has severe palmar pallor.

Part 2:

	Does the child have signs of:		
	Severe pallor	Some pallor	No pallor
Photograph 83		✓	
Photograph 84			✓
Photograph 85a	✓		
Photograph 85b			✓
Photograph 86	✓		
Photograph 87		✓	
Photograph 88	✓		

DAY 10: LIST OF ACTIVITIES

CLINICAL SESSION

Assess and classify the child age 2 months to 5 years	Demonstration
Allocation of cases to students	Observation and feedback

To Prepare	<ul style="list-style-type: none"> - Ask participants to bring chart booklets, pencils, timing devices. - Bring 2 copies of Recording Form per participant. - Make sure needed supplies are available in clinic:
Participant Objectives	<ul style="list-style-type: none"> - Assess and classify sick child through ear problem and check for malnutrition and anaemia. - Use good communication skills. - Use weight for age chart.
Facilitator Procedures	<p>Choose children with fever; fever with and without measles, and fever with other rashes. Also children with diarrhoea or with cough or difficult breathing⁶. Also select cases with ear problems and any child with one or more of the following: visible severe wasting, some or severe palmar pallor and oedema of both feet. Also choose children who may have malnutrition or anaemia.</p> <ol style="list-style-type: none"> 1. Demonstrate how to assess a sick child for fever, and, if feasible, how to assess child with fever who has signs suggesting measles. Review how to decide malaria risk.¹ Tell participants the risk of malaria for patients attending this clinic. 2. Demonstrate how to assess and classify ear problem. 3. Demonstrate how to check for malnutrition and anaemia and use weight for age chart. 4. Assign patients to participants. Participants assess and classify through malnutrition and anaemia. If a child with stiff neck or measles presents, demonstrate signs to all participants. If a

1

	<p>child with visible severe wasting, palmar pallor or oedema presents, show to all participants.</p> <p>5. Observe each participant to be sure child has been assessed and classified correctly. If you cannot observe, ask participant to present case.</p>
At the end of the session	<p>1. Lead discussion to summarize session and give feedback on skills practiced today.</p> <p>2. Discuss words mothers understand for: measles, fever, is fever present every day? ear problem, ear pain, ear discharge.</p> <p>3. Remind participants to keep Recording Forms.</p> <p>4. Complete Monitoring Checklist.</p>

Demonstration:

Before you demonstrate the assessment, review the techniques for assessing stiff neck and the techniques for drawing the child's attention so you can observe if the child's neck can move freely:

-- Watch the child as you talk with the mother. Can the child move and bend his neck as he watches you talk or responds to other sounds or sights?

-- Draw the child's attention to his toes by tickling his toes. Or use a sounding timer or shine a torch so the child has to look down to see it.

-- If you still have not seen the child move his neck, lean over the child and gently support his back and shoulders with one hand. Hold his head with the other hand. Gently bend the child's head forward toward the chest. Does the neck bend easily? If so, the child does not have the sign "stiff neck." If the neck feels stiff or there is resistance when you try to bend it, the child has the sign "stiff neck."

If a child with stiff neck presents during the session, demonstrate the sign to all the participants. (Ensure that the a child with stiff neck is urgently referred to the hospital.) Also demonstrate to all participants any child with measles, especially a child who has complications of measles such as mouth ulcers, pus draining from the eye or clouding of the cornea.

DAY 11: LIST OF ACTIVITIES

S NO	Task	Method	Time
1	Students read pages 81 through 89	Self reading	20 Min
2	Teaching a mother to Care for a dehydrated child	Role play	40 Min
3	Students read pages 90 through 93	Self reading	20 Min
4	Assessing feeding	Role play	20 Min
5	Giving feeding advice using good communication skills	Demonstration Role play	20 Min
6	Giving advice on fluid and when to return using good communication skills	Demonstration Role play	20 Min

1	Students read pages 81 through 89	Self reading	20 Min
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2	Teaching a mother to Care for a dehydrated child	Role play	30 Min
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Role play -- Teaching a mother to care for a dehydrated child

Purpose: To practice talking with mothers about treatment of diarrhoea.

Highlights of the case:

Part 1 - A health worker has decided that a baby named Lura has diarrhoea with SOME DEHYDRATION and should be treated with ORS solution on Plan B. In the role play, the health worker will instruct the mother how to give the ORS to the child.

Part 2 - Lura's dehydration has improved and she is ready for Plan A. In the role play, the health worker will teach the mother Plan A.

Preparations:

Gather the following supplies:

- * The *TREAT* chart or chart booklet opened to diarrhoea treatment Plans A and B
- * Doll or other "baby"
- * ORS solution, already mixed (for Part 1)
- * Cup and spoon

Write the highlights of the case on a flipchart.

Select two participants to play the roles of a mother and a health worker in Part 1. Select two other participants to play these roles in Part 2. This will give more participants a chance to practice. Explain the roles and give the participants time to prepare.

Take the participants aside who will be the mothers. Encourage them to act like normal, concerned mothers. Suggest that the mother could ask for some medicine to stop the diarrhoea. Or, she could become alarmed when Lura vomits some of the solution.

To conduct Part 1:

Tell the participants that a health worker will practice talking with a mother about treatment of diarrhoea. Have observers read "The Situation" in the module.

Remind the group that the role play will not include assessing or classifying Lura, which has already been done. Remind the observers to refer to the appropriate diarrhoea treatment plan and to note how the health worker communicates with the mother.

Introduce the mother and the health worker. Then ask the players to begin Part 1 of the role play.

When Part 1 is finished and the mother is successfully giving ORS solution, thank the players. Then stop the role play and lead a discussion. Ask the observers to comment on the following:

- * What did the health worker do well?

- * Did the health worker leave out anything important?
Be sure to comment on:
 - if the health worker told the mother the amount of ORS to give in the next 4 hours,
 - if the health worker said to give the ORS slowly, and
 - if he showed her how to give the fluid with a spoon.
- * How were the 3 basic teaching steps (information, example, practice) demonstrated?
- * How did the health worker check the mother's understanding?

To conduct Part 2:

After the discussion, tell participants that 4 hours has passed. The mother has already been taught how to mix ORS. In this part of the role play, the health worker will teach the mother Plan A, but does not need to mix ORS. Remind observers to refer to Plan A and to note the communication skills that the health worker uses.

Introduce the other two players, Lura's mother and the health worker. Ask them to begin Part 2 of the role play.

When Part 2 is finished, thank the players. Lead a discussion of the role play. Ask the observers to comment on the following:

- * What did the health worker do well?
- * Did the health worker leave out anything important?
Be sure to comment on:
 - if the health worker told the mother the amount of fluid to give and when to give it,
 - if the health worker said to continue giving normal fluids,
 - if he told her to give extra fluid until the diarrhoea stops,
 - if he discussed continued feeding, and
 - if he discussed when to return immediately.

- * How were the 3 basic teaching steps (information, example, practice) demonstrated?
- * How did the health worker check the mother's understanding?

3	Students read pages 90 through 93	Self reading	20 Min
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4	Assessing feeding	Role play	20 Min
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ROLE PLAY: ASSESSING FEEDING

There is one role play in this exercise, and there are two more in later exercises. Each role play is instructionally important and teaches certain counselling steps or content. Do not omit role plays.

In the facilitator notes for each role play, there will be a note such as the following which lists the main points covered. Do not read this to the students beforehand, but ensure that the points are covered in discussion afterwards.

Counselling steps covered in this role play:

- *asking questions to assess feeding*
- *identifying correct feeding and feeding problems*

Highlights of case: *Breastmilk is being reduced too quickly as complementary food is added. Feeding has changed during illness (sugar water added).*

Plan to assign every participant a role in one of the role plays in this module. If a participant does not play a role in this exercise, be sure that he or she is assigned a role in a later role play.

1. Assign the role of physician to a participant who seems confident and understands the course materials well. Explain that the "physician" will use the questions on the Sick Child Recording Form to identify feeding problems. Explain that the physician may need to ask additional questions if the mother's answers are unclear or incomplete.

Remind the physician that he is not giving advice in this role play but simply identifying the feeding problems and correct feeding practices.

2. Assign the role of the mother in the role play to a different participant. (If there are not enough women, men can play the roles of mothers.) Give the "mother" the box on the next page describing her child's feeding. This box may be copied or cut out. Tell the mother that she may make up additional realistic information that fits the situation if necessary. She should behave as a real mother might behave.
3. Conduct the role play. Students not playing roles should record answers on the Sick Child Recording Form. They should make notes of correct feeding practices and feeding problems discovered.
4. After the role play, lead a brief discussion. Review the answers that the mother gave to the feeding questions. List on the flipchart or chalkboard correct feeding practices mentioned in the role play, and feeding problems discovered. (See Answer Sheet.) Also discuss whether all the necessary questions were asked of the mother. If not, what additional questions should have been asked? What might be the consequences of not asking these questions?

Role Play - Description for Zubaida's Mother

You are the mother of Zubaida, a 5-month-old girl. You have brought her to the physician because she has a cough and runny nose. The physician has already told you about a soothing local remedy for cough. Now the physician will ask you some questions about how you feed Zubaida.

You are still breastfeeding Zubaida about 3 times each day and once during the night. In the past month you have started giving her a thin cereal gruel (*khichri*) because she seemed hungry after breastfeeding and your mother-in-law suggested it. You give the gruel by spoon 3 times each day. You do not own or use a feeding bottle.

During the illness Zubaida has breastfed as usual, but she spits out the gruel and cries. Your friend suggested giving Zubaida some sugar water instead of the gruel while she is sick. You have tried giving the sugar water by cup, and Zubaida seems to like the sweet taste.

5	Giving feeding advice using good communication skills	Demonstration Role play	20 Min
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DEMONSTRATION ROLE PLAY: GIVING FEEDING ADVICE USING GOOD COMMUNICATION SKILLS

Counselling steps and communication skills covered in this role play:

- *asking questions to assess feeding*
- *identifying correct feeding and feeding problems*
- *praising the mother when appropriate*
- *advising the mother using simple language and giving only relevant advice about feeding*
- *using the Mother's Card*
- *checking the mother's understanding*

*This demonstration gives students a model of the entire process of **feeding assessment and counselling**. (A later continuation of this demonstration covers advice about fluids and when to return.)*

Highlights of case: *Child has lost appetite during illness. Information given on complementary feeding for an 8-month-old.*

This is a scripted role play about Amit, an 8-month-old child. You may play the role of the physician and have a participant or your co-facilitator read the role of the mother. You will need an extra copy of the script for the mother; you may use the one in your co-facilitator's guide. Have the Mother's Card ready to use. A baby doll will be helpful. Practice the demonstration at least once before doing it in front of the group.

To the left of the script, the communication skills being used are listed in italics. Write these skills on the flipchart or blackboard before the role play:

Ask, listen
Praise
Advise
Check understanding

You or your co-facilitator should stand near the flipchart or blackboard during the role play. Point to each skill as it is used in the script. This will make students aware of the skills being used.

After the role play, ask students to tell you what feeding problems were found and whether all of the relevant advice about feeding was given.
Feeding problems: Amit is not feeding well during illness. Amit needs more varied complementary foods. He also needs one more serving per day. All of the relevant advice was given.

SCRIPT FOR DEMONSTRATION ROLE PLAY

- Physician: Let's talk about feeding Amit. Do you breastfeed him?
Ask, listen
- Mother: Yes, I'm still breastfeeding.
- Physician: That's very good. Breastmilk is still the best milk for Amit.
Praise
Ask, listen
How often do you breastfeed him each day?
- Mother: It varies. Maybe 4 or 5 times.
- Physician: Do you also breastfeed at night?
- Mother: Yes, if he wakes up and wants to.
- Physician: Good. Keep breastfeeding as often as he wants.
Praise
Ask, listen
Tell me, are you giving Amit any other foods or fluids besides breastmilk?
- Mother: Sometimes I give him cooked cereal, or banana mixed in yoghurt.
- Physician: Those are good choices. How often do you give them?
Praise
Ask, listen
- Mother: When he seems hungry.
- Physician: How often is that?
- Mother: Usually about 2 times a day.
- Physician: Do you ever give Amit a feeding bottle?
- Mother: No, I don't have one.
- Physician: Good. It is much better to use a spoon or cup.

Praise
Ask, listen Tell me, during this illness, has Amit's feeding changed?

Mother: He is still breastfeeding, but he has not been hungry for the cereal or yoghurt.

Physician:
Advise
Ask, listen Well, he's probably just lost his appetite due to the fever.... Most children do. Still, keep encouraging him to eat. Try giving him his favourite nutritious foods. Give him small servings frequently. Have there been any other problems with feeding?

Mother: No, I don't think so.

Physician:
Advise You said you were feeding Amit cereal 2 times a day. At his age, he is ready to eat foods like cereal about 3 times each day. Make sure the cereal is thick. Amit is ready for some different foods too. Try adding some mashed vegetables or beans to the cereal, or some very small bits of meat or fish. Also add a little bit of oil for energy. Would this be possible for you to do?

Mother: Yes, I think so.

Physician:
Advise Let me show you what Amit needs. Since he's 8 months old, he should get the foods under this picture. (*Mention some foods from the Feeding Recommendations box.*)

Mother: Should I give him these foods now, while he is sick?

Physician: Try offering them. He might like the taste, and these are the best foods if he will eat them. Offer the foods that he likes. And most importantly, keep breastfeeding.

Mother: All right. I will try adding some more things to the cereal.

Physician:
Check understanding Good. What do you have that you will add?

Mother: I will add a little oil, and some mashed peas. Sometimes I can add vegetables or chicken, when I have one.

Physician:
Check understanding Good. And how often will you try to feed Amit these foods?

Mother: Three times each day.

Physician: That's right. I am sure you will feed him well.
Praise

6	Giving advice on fluid and when to return using good communication skills	Demonstration Role play	20 Min
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DEMONSTRATION ROLE PLAY: GIVING ADVICE ON FLUID AND WHEN TO RETURN USING GOOD COMMUNICATION SKILLS

The earlier demonstration about Amit covered the steps of assessing feeding, identifying feeding problems, and counselling the mother about feeding. This demonstration completes the interaction by covering advising the mother about fluid and when to return. In other words, this role play covers the remaining parts of the COUNSEL chart.

Highlights of the case: *Physician uses the Mother's Card to teach the signs to return immediately, including the very important signs -- **fast breathing** and **difficult breathing**.*

Continue the scripted role play about Amit beginning on the next page. Have the same people play the roles of the physician and mother. Use the Mother's Card. A baby doll will be helpful. Practice the demonstration at least once before doing it in front of the group.

Before the role play, remind students that Amit is 8 months old and has no general danger signs. He has: NO PNEUMONIA: COUGH OR COLD, MALARIA, NO ANAEMIA AND NOT VERY LOW WEIGHT.

In the previous demonstration, the physician assessed feeding and found three feeding problems: Amit was not feeding well during illness; he needed more varied complementary foods; and he needed one more serving each day. The physician counselled the mother to keep feeding during illness even though Amit had lost his appetite. The physician also gave advice on good complementary foods for Amit and advised the mother to feed him 3 times per day. Now, the physician will give advice on

fluid and when to return. (Point to the parts of the *COUNSEL* chart to be used.)

To the left of the script, notice that the communication skills are again listed in italics. You previously wrote these on the flipchart or blackboard:

Ask, listen

Praise

Advise

Check understanding

As in the previous demonstration about Amit, you or your co-facilitator should point to each skill as you use it in the script.

SCRIPT FOR DEMONSTRATION ROLE PLAY, CONTINUED

- Physician:
Ask, listen We've already talked about how important breastfeeding is. Does Amit take any other fluids regularly?
- Mother: Sometimes I give him orange juice.
- Physician:
Praise
Advise
Ask, listen That's good. During illness children may lose fluids due to fever, and it is important to give extra fluids to replace those. You can do that by breastfeeding frequently and by giving fluids like orange juice or soups as well. How do you give him his orange juice now?
- Mother: In a cup. I hold it while he sips.
- Physician:
Praise

Advise That's very good. That is the best way to give him extra fluid. Now we need to talk about when you should bring Amit back to see me. If his fever continues for 2 more days, bring him back. Otherwise, come back in 5 days so we can find out how he is feeding.
- Mother: In 5 days?
- Physician:
Ask, listen Yes, that will be Monday. If you can come in the afternoon at 3:00, there will be a nutrition class that would be helpful for you. Can you come then?
- Mother: I think so.
- Physician:
Advise I also want you to bring Amit back **immediately** if he **is not able to drink** or if he **becomes sicker**. This is very important.
- Mother: I understand.
- Physician:
Advise Good. Now I am going to tell you two more signs to look for so you will know if Amit needs to come back. The signs are **fast breathing** and **difficult breathing**. If you notice Amit breathing fast, or having difficulty breathing, bring him back **immediately**. These signs mean he may have developed pneumonia and may need some special medicine. I do not expect this will happen, but I want you to know what to look for. Here is another picture to help you remember to look at Amit's chest for fast breathing. If Amit is breathing

faster than usual, or he seems to have trouble breathing, bring him back.

Mother: All right.

Physician: I also want to see Amit again in one month for his measles immunization. I know this is a lot to remember, but don't worry, I'm going to write it down for you.

Check Can you remember the important signs to bring Amit back
Understanding immediately?

Mother: Yes, fast breathing and difficult breathing.

Physician: Good. And how will you recognize fast breathing?

Mother: If it's faster than usual?

Physician: Good. That's right. And there were two more signs that I told you first.
Praise

Mother: Oh yes, if he cannot drink and...?

Physician: If he cannot drink and if he becomes sicker. Let's look again.
Check
understanding

Mother: Not able to drink....sicker....fast or difficult breathing....

Physician: Excellent. Bring Amit back if any of these signs appear. I'm also writing the day to come back for measles immunization here. That is very important to keep Amit from getting measles. And remember, if he still has fever after 2 days, you also need to come back. Do you have any questions?
Praise

Mother: No, I think I understand.

Physician: You were right to bring Amit today. I will see you again on Monday. I hope his cough is better soon.
Praise

DAY 12: LIST OF ACTIVITIES

CLINICAL SESSION

Assess, classify and treat the sick child.	Demonstration
Allocation of cases to students	Observation and feedback

To Prepare	<ul style="list-style-type: none"> - Ask participants to bring chart booklet, pencils, timing devices. - Bring 2 Recording Forms per participant. - Place tablets or syrup, drug label, envelope or paper to wrap tablets on table or tray.
Participant Objectives	<ul style="list-style-type: none"> - Assess and classify a sick child; practice identifying the child's treatment. - Advise mothers when to return immediately. - Teach mother to give her child an oral drug at home. - Use a Mother's Card to advise and teach mothers. - Use good communication skills.
Facilitator Procedures	<p>Choose sick children with one or more main symptoms.</p> <ol style="list-style-type: none"> 1. Assess and classify a child and, using chart or chart booklet and a Recording Form, demonstrate how to identify the child's treatment. 2. Demonstrate how to advise mother when to return immediately. Use the relevant part of the Mother's Card. 3. Review steps on <i>TREAT</i> chart and demonstrate how to teach mother to give an oral drug at home. 4. Assign patients to participants. 5. Supervise participants carefully as they practice 3 new steps: identifying treatment, advising when to return immediately and giving oral drugs. 6. Give feedback and guidance as needed. 7. Return child to clinic with note for treatment.

At the end of the session	<ol style="list-style-type: none"> 1. Lead discussion to summarize session and give feedback on skills practiced and demonstrated today. 2. Discuss problems with compliance and words that mothers understand for: becomes sicker, develops a fever, drinking poorly, tablet, syrup. 3. Remind participants to keep their Recording Forms. 4. Complete Monitoring Checklist.
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Observing participants:

Supervise closely the first time participants counsel mothers. Make sure they:

- know where to record the mother's answers on the Recording Form
- teach mothers the signs to return immediately
- check the mothers' understanding

If you cannot observe all of a participant's work with a case, check his Recording Form for assessment and classification. Then observe him counselling the mother.

Make sure participants use good communication skills. They should:

- ask all the questions to assess feeding
- praise the mother for what she is already doing well
- limit feeding advice to what is relevant
- give accurate advice
- ask checking questions

SECTION C: MONITORING CLINICAL SESSIONS.

Checklist for Monitoring Clinical Sessions

You will use a Checklist for Monitoring Clinical Sessions to monitor each participant's progress in learning the case management process. Refer to the checklists which follow these instructions as you read about how to use them.

There is a checklist to use in sessions with sick children (age 2 months up to 5 years) and a checklist to use in sessions with young infants. Each checklist is arranged so you can record results for 3 participants who manage up to 6 patients each without turning the page. If there are more than 6 patients managed by a participant in a morning, use a second checklist.

Do not spend all your time in the outpatient session completing the checklist. Concentrate on actually observing participants and giving feedback. You can complete the checklist for each child from memory after the case is completed since you only need to record the child's age, classifications and treatments or counselling given.

To use the checklist:

1. Tick (✓) each classification the child actually has (according to your assessment). Tick the true classifications, not the ones assigned by a participant if he is in error.
2. If there is an error in the participant's classification, circle the tick that you have entered by the correct classification. The participant's error could be in the assessment or could be misclassification based on correct assessment. Even if the classification is correct, if there was an error in the assessment, circle the tick and annotate the assessment problem.
3. For the step "Identify Treatment Needed" tick if the participant performed this step and wrote the correct treatment on the Recording Form. If he made an error, circle the tick mark. (Common errors are skipping treatments, not crossing off treatments that are not needed, or recording treatments that are not needed because the conditional "if" was ignored.)
4. For the rows for doing treatments (oral drugs, Plan A, Plan B and treating local infections), for "Counsel When To Return" and for the steps for counselling on feeding, tick if the participant actually performed the step.

Note: Giving the treatment means teaching the mother how to give it and administering first dose or the initial treatment.

If there is any error in the treatment or counselling, circle the relevant tick. There could be an error in the treatment (either the dosage or explanation to the mother) or counselling.

5. For each circled tick, note the problem in the space at the bottom of the checklist. Note the problems very briefly. You can use letters or numbers next to the circles to annotate the problems. These notes will help you when you discuss the participants' performance at the facilitator meeting. These notes will also help you keep track of the skills that need further practice.

6. If you did not see the participant manage the case, take note of the child's condition yourself. Then ask the participant to present the case or refer to the participant's Recording Form. Tick the checklist as described above.

7. When you complete the checklist and record information about the case:

- If the child does not have a main symptom, do not tick that section. There is no classification to record.
- If the participant has not yet learned the steps related to certain rows of the checklist, leave these rows blank. If there was no time for the treatment or counselling, leave these rows blank.
- Draw a line under the row for the last step that the group practiced.

An example of a completed checklist is on the next page.

Checklist for monitoring clinical sessions

This is an example of a monitoring checklist that has been completed after a busy clinic session. The facilitator has used a simple lettering system to annotate the problems.

Checklist for Monitoring Clinical Sessions

Date:

SICK YOUNG INFANT AGE UPTO 2 MONTHS

Tick correct classifications.

Circle if any assessment or classification problem.

Annotate below

Participants Initials		Vinod						Ram							
SICK YOUNG INFANT (weeks)		2	1							1	6				
POSSIBLE BACTERIAL INFECTION/ JAUNDICE	Possible serious bacterial infection														
	Local bacterial infection														
	Severe Jaundice														
	Jaundice														
	Low Body temperature														
DIARRHOEA	Severe dehydration														
	Some dehydration	A													
	No dehydration														
	Severe Persistent Diarrhoea														
	Severe dysentery														
FEEDING	Breastfeeding attachment & suckling assessed														
	Not able to feed-Possible serious bacterial infection														
	Feeding problem														
	No feeding problem														
IDENTIFY TYREATMENT NEEDED															
Tick treatments or counseling actually given. Circle if any problem. Annotate below															
TREAT and COUNSEL	Oral drugs														
	Teach correct positioning and attachment														
	ADVICE on Home Care and attachment														
SIGNS DEMONSTRATED IN ADDITIONAL CHILDREN															

PROBLEMS: A:WRONG ASSESSMENT OF SKIN PINCH

SICK CHILD – AGE 2 MONTHS UPTO 5 YEARS

PARTICIPANT INITIALS																				
SICK CHILD AGE (months)																				
DANGER SIGN																				
COUGH	Severe pneumonia or Very severe Disease																			
	Pneumonia																			
	No pneumonia : cough or cold																			
DIARRHOEA	Severe dehydration																			
	Some dehydration																			
	No dehydration																			
	Severe persistent diarrhoea																			
	Persistent diarrhoea																			
FEVER	Dysentery																			
	Very severe febrile disease																			
	Malaria																			
	Fever Malaria unlikely																			
	Severe Complicated measles																			
	Measles with eye or mouth complications																			
EAR PROBLEM	Measles																			
	Mastoiditis																			
	Acute ear infection																			
	Chronic ear infection																			
MALNUTRITION	No ear infection																			
	Severe malnutrition																			
	Very low weight																			
ANAEMIA	Not very low weight																			
	Severe anaemia																			
	Anaemia																			
IDENTIFY TREATMENT NEEDED	No anaemia																			
	Tick treatments or counseling actually given. Circle if any problem. Annotate below.																			
	COUNSEL WHEN TO RETURN																			
TREATMENTS GIVEN	Oral drugs																			
	PLAN B																			
	Local bacterial infection																			
COUNSEL FEEDING	Asks feeding questions																			
	Feeding problems identified																			
	Gives advice on feeding problems																			
SIGNS DEMONSTRATED IN ADDITIONAL CHILDREN																				

PROBLEMS

Group Checklist of Clinical Signs

Participants will monitor their own clinical practice experience by using their Recording Forms to complete a Group Checklist of Clinical Signs.

A sample checklist is on the next two pages. The first page contains the signs to observe in young infants age up to 2 months. The second page lists additional signs that are usually seen in children age 2 months up to 5 years.

To use the group checklist:

1. Obtain or make an enlarged version of each page of the checklist and hang it on the wall of the classroom. (You can copy it onto flipchart paper.)
2. When participants return to the classroom after clinical practice each day, they should indicate the signs they have seen that day by writing their initials in the box for each sign. They should indicate signs that they have seen in either the outpatient session or the inpatient session.
3. Each day they will add to the same checklist.
4. Monitor the Group Checklist to make sure that participants are seeing all of the signs.
 - If you notice that participants have not seen many examples of a particular sign, take every opportunity to show participants this sign when a child with the sign presents during an outpatient session.
 - Or, in facilitator meetings, talk with the inpatient instructor and discuss locating in the inpatient ward a child or young infant with the sign the participants need to observe.

SIGNS IN YOUNG INFANTS

Age up to 2 Months

(Note: These signs may also be observed in older infants and children age up to 5 years.)

Mild chest indrawing in young infant (normal)	Fast breathing in young infant	Severe chest indrawing in young infant	Nasal flaring
Grunting	Bulging fontanelle	Yellow Palms and Soles	Red umbilicus or draining pus
Many skin pustules Or a big boil	Skin pustules	Lethargic or unconscious young infant	Less than normal movement
No attachment at all	Not well attached to breast	Good attachment	Not suckling at all
Not suckling effectively	Suckling effectively	Thrush	Ear Discharge
Cold To Touch			

GROUP CHECKLIST OF CLINICAL SIGNS

Sick Child Age 2 Months Up To 5 Years

Not able to drink or breastfeed	Vomits everything	Bulging fontanelle	Lethargic or unconscious
Fast breathing	Chest in drawing	Stridor in calm child	Restless and irritable
Sunken eyes	Drinking poorly	Drinking eagerly, thirsty	Very slow skin pinch
Slow skin pinch	Stiff neck	Runny nose	Generalized rash of measles
Red eyes	Mouth ulcers	Deep and extensive mouth ulcers	Pus draining from eye
Clouding of the cornea	Pus draining from ear	Tender swelling behind the ear	Visible severe wasting
Severe palmar pallor	Some palmar pallor	Oedema of both feet	

SECTION D: GUIDELINES FOR STUDENT ASSESSMENT

1. Introduction

The Integrated Management of Neonatal and Childhood Illness (IMNCI) strategy has been incorporated into the pre-service training of graduate medical students in India so that it would improve the skills of care providers. It is important that students should be able to demonstrate their competence in IMNCI. This also means that principles and concepts of IMNCI need to be incorporated into student assessment.

Why assess students in IMNCI?

The primary objective of assessment is to ensure that students have achieved a minimal level of competence and to grade them. However, there are also other important reasons for assessing students. Assessment helps to:

- Motivate students by providing feedback on their progress;
- Decide if students should progress to the next stage of study;
- Ensure that important subjects are given priority in the curriculum;
- Decide if the academic program has effectively met its objectives; and
- Offer evidence to regulating authorities that standards are being met.

What should the students be assessed for?

The essential competencies (both knowledge and skills) that students should be assessed for can be organized as follows:

1. Assess the child
2. Classify the child
3. Identify actions to be taken
4. Treat the child
5. Counsel the mother

2. How to Assess the Students ?

Assessment Methods

Formative Assessment.

It is the regular monitoring of students during their period of study. Its primary aim is to improve student learning. It involves periodic assessments to identify the strengths and weakness of students and provide feedback. It also gives feedback to teachers on the effectiveness of their teaching.

Assessment of Knowledge.

For the assessment of knowledge in IMNCI the following methods can be used:

- **Multiple choice questions (MCQs)**
(one or more correct answer, from 4 or 5 suggested answers) (*Annexure I*).
- **Short answer questions (SAQs)**
(questions requiring a short answer , 1-2 sentences) (*Annexure I*).
- **Written case studies**
A case is provided with variable amount of patient data and several questions,
e.g. MCQ, SAQ, are asked about assessment, classification and clinical management.

Assessment of Skills

For the assessment of skills in IMNCI the following methods can be used:

- **Direct observation of student performance**
The teacher observes the student performance during case management of a patient using a standard case-recording form and a checklist (*Sample checklist placed in Annexure II and III*).
- **Videos and photos**
- **Role plays**
 - **Objective Structured Clinical Examination (OSCE)**
Students rotate through a series of stations where they are observed by examiners while undertaking clinically related tasks. Thus all students are examined on the same set of cases by the same set of examiners (*Details or organization of OSCE are given in Annexure IV*).

Summative Assessment

It is conducted at the end of the course. It can be done at a convenient time after the students have completed their final clinical posting in pediatrics.

Assessment of Knowledge

For the assessment of knowledge in IMNCI it is suggested that a combination of MCQs and SAQs be used for summative assessment. It may be an independent assessment or may be merged with the end posting pediatric assessment. A sample of some questions used for summative assessment is in *Annexure I*.

Assessment of Skills

For the assessment of skills in IMNCI during summative assessment it suggested the following methods can be used:

- **Direct observation of student performance**

As in formative assessment, the teacher observes the student performance during case management of a patient using a standard case-recording form and a checklist (*Annexure II and III*). The student can be given either two cases (one each of a young infant and a child 2 months upto 5 years) or only one case of a child 2 months upto 5 years and the young infant tested as part of OSCE.

- **Objective Structured Clinical Examination (OSCE)**

As informative assessment, students rotate through a series of stations where they are observed by examiners while undertaking clinically related tasks (*Annexure IV*).

3. Integrating IMNCI Evaluation with Pediatric Assessment

Since the ultimate objective is to integrate IMNCI as part of the routine Pediatric curriculum and assessment in undergraduate education in India, each institution has to decide its own methods of assessing IMNCI. This will depend on the number of students, examiners and time available. One of the suggested models could be that summative assessment of knowledge in IMNCI could be evaluated during the pre-final theory examination through MCQs and SAQs. Similarly summative assessment of skills can be done during the last end posting pediatric examination by having either one of two clinical cases as IMNCI case or some parts of pediatric OSCE as IMNCI, or use only OSCE for IMNCI evaluation.

Annexure I

*IMNCI Knowledge Assessment
Samples of Multiple Choice Questions (MCQs) and
Short Answer Questions (SAQs)*

1. Multiple Choice Questions - Single correct response

Each item is followed by four possible responses. Only one of them is correct. For each item, select the correct response by circling the appropriate letter of the answer. Each correct response is worth one point.

What is the cut-off for fast breathing in a child who is 11 months old.

- a. 60 breaths or more
- b. 50 breaths or more
- c. 40 breaths or more
- d. 30 breaths or more

2. Multiple Choice Questions – Multiple correct responses

*Each item is followed by four possible responses. One or more of these are correct. For each item, select **ALL** correct responses by circling the appropriate letter next to your answer. Each correct response is worth one point.*

Which of the following signs in a jaundiced young infant will classify the infant as SEVERE JAUNDICE

- a. yellow palms and soles
- b. age less than 48 hours
- c. age more than 14 days
- d. convulsions

3. Short Answer questions

Read the statements and answer the questions.

1. To classify the dehydration status in a child with diarrhea you should LOOK and FEEL for:

- a. _____
- b. _____
- c. _____
- d. _____

Read the following cases and answer the questions.

2. Karim has been brought for follow-up visit for pneumonia. He is 4 years old and weighs 14 kg. His axillary temperature is 37°C. He has been taking cotrimoxazole His mother says he is still very sick and has vomited thrice today.

- a. *How will you reassess Karim today? List the signs you would look for and the questions you would ask his mother.*

SAMPLE MCQs

IMNCI Summative Assessment

(Max. Marks 100)

Directions (Q 1- 6) : Each item is followed by four possible responses. Only one of them is correct. For each item, select the correct response by circling the appropriate letter of the answer. Each correct response is worth one point.

1. What is the cut-off for fast breathing in a child who is 11 months old.
 - a. 60 breaths or more
 - b. 50 breaths or more
 - c. 40 breaths or more
 - d. 30 breaths or more

2. A sick young infant is classified as LOW BODY TEMPERATURE when the temperature is
 - a. 36.5-37.4 degrees C
 - b. 35.5-36.4 degrees C
 - c. 34.5-35.4 degrees C
 - d. 33.5-34.4 degrees C

3. All of the following are signs of good attachment to the breast *except*
 - a. Mouth is wide open
 - b. Lower lip is turned outwards
 - c. More areola is visible below than above the nipple
 - d. Chin is touching the breast

4. Which children should be checked for malnutrition and anemia
 - a. all children with feeding problem(s)
 - b. all children under 12 months of age
 - c. all children brought to the clinic
 - d. all children who are not breast fed

5. Prophylactic iron and folic acid is given to children
 - a. 6 months or older
 - b. 12 months or older
 - c. 18 months or older
 - d. 24 months or older

6. The concentration of gentian violet used for treatment of oral thrush is
 - a. 0.25%
 - b. 0.50%
 - c. 2.5 %
 - d. 5.0%

Directions (Q 7-18) : Each item is followed by four possible responses. One or more of these are correct. For each item, select **ALL** correct responses by circling the appropriate letter next to your answer. Each correct response is worth one point.

7. Which of the following signs in a jaundiced young infant will classify the infant as SEVERE JAUNDICE
- a. yellow palms and soles
 - b. age less than 48 hours
 - c. age more than 14 days
 - d. convulsions
8. Which children should be assessed for feeding
- a. all children brought to the clinic
 - b. all children less than 24 months
 - c. all children classified as ANEMIA
 - d. all children classified as LOW WEIGHT
9. In addition to assessing dehydration status, the mothers of ALL children with diarrhea should be asked
- a. For how long has the child had diarrhea?
 - b. How many times did the child have watery diarrhea?
 - c. What did the child eat before the diarrhea started?
 - d. Is there blood in stools?
10. A child should be assessed for the main symptom of FEVER if the child
- a. has a history of fever
 - b. does not feed well
 - c. feels hot
 - d. has temperature 37.5 degrees C or above
11. Vitamin A is given to
- a. all children with PERSISTENT DIARRHEA
 - b. all children with MEASLES
 - c. all children with SEVERE MALNUTRITION
 - d. all children with VERY LOW WEIGHT
12. In a child with DIARRHEA, NO DEHYDRATION, in the presence of which of the following complaints is the mother asked to return immediately
- a. difficulty in breathing
 - b. has blood in stools
 - c. is drinking poorly
 - d. develops a fever
13. In a child aged 24 months, with which classifications would the mother be asked to return for follow up in 2 days
- a. Pneumonia
 - b. Acute ear infection
 - c. Persistent dysentery
 - d. Malaria
14. Which of the following classifications are indication for urgent referral in a young infant < 2 months age
- a. POSSIBLE SERIOUS BACTERIAL INFECTION
 - b. SEVERE PERSISTENT DIARRHEA
 - c. SEVERE MALNUTRITION
 - d. SOME DEHYDRATION with LOW WEIGHT

15. In a child with history of fever what questions would you ask a mother
 - a. Fever for how long?
 - b. If more than 15 days has the fever been present every day?
 - c. Have you traveled recently to a high-risk malaria area?
 - d. Has the child had measles within the last 3 months?

16. The contraindications to immunization with DPT2/DPT3 include
 - a. HIV infection
 - b. Convulsions within 3 days of DPT
 - c. Acute neurologic disease of CNS
 - d. A child who is being referred urgently

17. Which of the following conditions require referral but not urgently
 - a. Severe dysentery
 - b. Cough more than 15 days
 - c. Severe Persistent diarrhea
 - d. Fever for more than 7 days

18. Identify the good checking questions
 - a. Do you remember how to mix ORS?
 - b. How often should you breastfeed your child?
 - c. Will you remember to wash your hands?
 - d. How many times will you give the drug?

Directions (Q 19-21): Read the description of the following case scenario and tick (3) the correct answers to each question. Each correct response is worth one point. In a given question all correct responses are required to get the full points.

19. Anita is a 6 week old girl. Has diarrhea with skin pustules. You classify her as having LOCAL BACTERIAL INFECTION, SEVERE DEHYDRATION and LOW WEIGHT. Anita is being referred for SEVERE DEHYDRATION. Following is a list of treatments. Tic(3) the **urgent, pre-referral** treatments that Anita needs.
 - a. _____ Give first dose of intramuscular antibiotic
 - b. _____ Give fluids for severe dehydration
 - c. _____ Continue breast feeds
 - d. _____ Apply Gentian violet locally
 - e. _____ Advise the mother when to return
 - f. _____ Ask the mother to keep the young infant warm

20. Raj is a 2 year old boy. He is lethargic. He lives in a high risk malaria area and has fever of 39°C. You classified Raj as having VERY SEVERE FEBRILE DISEASE and CHRONIC EAR INFECTION. He has some palmer pallor so is classified as having ANEMIA, although he is not very low weight. He has never had a dose of metronidazole. Raj needs referral for VERY SEVERE FEBRILE DISEASE/ Following is a list of treatments. Tic(3) the **urgent, pre-referral** treatments needed.
 - a. _____ Give quinine for severe malaria (first does)
 - b. _____ Give first dose of appropriate antibiotic
 - c. _____ Treat the child to prevent low blood sugar
 - d. _____ Give one dose of paracetamol in clinic for high fever
 - e. _____ Dry the ear by wicking
 - e. _____ Give iron
 - f. _____ Advise the mother when to return

21. Suman is a 3 year old girl you have classified as PNEUMONIA. You have to teach the mother how to give Syp Cotrimoxazole at home to Suman. The steps to be followed are listed below but not in the order they should be done. Write number 1 against the first step and similarly 2, 3, etc , for each of the subsequent steps in order.

- a. _____ Demonstrate how to measure the correct dose
- b. _____ Tell the mother the reasons for giving co-trimoxazole
- c. _____ Check that the mother's understands how to give co-trimoxazole
- d. _____ Ask the mother to give the first dose of cotrimoxazole to Suman
- e. _____ Watch the mother practice measuring the dose by herself
- f. _____ Determine the dosage of cotrimoxazole for Suman

Directions (Q 22-26): **Read the statements and answer the questions. Each correct response is worth one point.**

22. To classify the dehydration status in a child with diarrhea you should LOOK and FEEL for:

- a. _____
- b. _____
- c. _____
- d. _____

23. List the correct steps the mother should do to treat umbilical infection at home

- a. _____
- b. _____
- c. _____
- d. _____

24. To classify fever in a child you should LOOK for:

- a. _____
- b. _____
- c. _____
- d. _____

25. Write the key elements in the treatment of dysentery

- a. _____
- b. _____
- c. _____
- d. _____

26. What are the three rules for the home treatment of diarrhea

- a. _____
- b. _____
- c. _____

Directions (Q 27- 30): **Read the following cases and answer the questions. This section is worth 24 points.**

27. Karim has been brought for follow-up visit for pneumonia. He is 4 years old and weighs 14 kg. His axillary temperature is 37°C. He has been taking cotrimoxazole His mother says he is still very sick and has vomited thrice today.

a. *How will you reassess Karim today? List the signs you would look for and the*

questions you would ask his mother.

When you assess Karim, you find he is able to drink and does not always vomit after drinking. He has not had convulsions. He is not lethargic or unconscious. He is still coughing (he has been coughing now for about 2 weeks). His breathing rate is 52 per minute. He has no chest indrawing or stridor. She is worried that he has not improved.

b. *How should you treat Karim? If you would give a drug, specify the dose and route.*

28. Laxmi has been brought for follow-up visit for dysentery. She is 10 months old and weighs 7 Kg. Her axillary temperature is 36.5°C. She has been taking cotrimoxazole.

a. *How will you reassess Laxmi today? List the questions you would ask her mother.*

Her mother says that the number of stools and amount of blood are the same. But her fever is better and her feeding is the same. You assess and find Laxmi is not dehydrated.

b. *How should you treat Laxmi? If you would give a drug, specify the dose and route.*

29. Chinki is 5 months old and weighs 3.5 Kg. She is classified as VERY LOW WEIGHT. When you assess Chinki's feeding, her mother tells you that she breast-feeds 4 times in 24 hours. She also gives Chinki formula milk by bottle twice in a day. She says she gives no other foods and Chink's feeding has not changed during the illness.

a. *What are Chinki's feeding problems?*

b. *What is the mother doing correctly to feed Chinki?*

c. *What feeding advice is needed?*

30. Sujoy is a 15 month old and has VERY LOW WEIGHT. The child shares the family food of rice and thin soup twice a day with 3 brothers and sisters. He does not get much food of his own. 104

a. What are the feeding problems in this child?

b. What feeding advice is needed?

Key to IMNCI assessment

1. b
2. b
3. c
4. c
5. b
6. a
7. a,c
8. b,c
9. a,d
10. a,c,d
11. b,c
12. b,c,d
13. a,d
14. a,d
15. a,d
16. b,c,d
17. a,c,d
18. b,d
19. a,b,c,f
20. a,b,c,d
21. f,b,a,d,e,c
22. general condition, sunken eyes, drinking fluid, skin pinch
23. wash hands, wash off pus and crusts with soap and water, apply 0.5% GV, wash hands
24. stiff neck, bulging fontanel, runny nose, signs of measles
25. Antibiotics, fluids, feeding, follow-up
26. Fluids, feeding, when to return
27. a. Check general danger signs, count RR, look chest indrawing and stridor.
Is the child breathing slower?, Is there less fever?, is the child eating better?
b. Amoxicillin, 250mg tid for 5 days
28. a. Assess for diarrhea. Are there fewer stools, Is there less blood in stools, is there less fever, is there less abdominal pain, is the child eating better
b. Not improved, refer to hospital
29. a. Less than 8 feeds/day, formula milk, using feeding bottle
b. Breast feeding, no change of feeding in illness
c. Increase feeding to 8 times a day, stop formula feeding
30. a. Frequency less, thin food, no separate serving, no active feeding
b. Frequency 5 times/day, nutritious serving , each serving of 1,5 cups, active feeding

Annexure II – Case Recording Form (Young Infant age up to 2 months)

MANAGEMENT OF THE SICK YOUNG INFANT AGE UP TO 2 MONTHS

Name: _____ Age: _____ Weight: _____ Temperature _____ °C

ASK: What are the infant's problems? _____ Initial visit? _____ Follow-up Visit? _____

ASSESS (Circle all signs present) **CLASSIFY**

CHECK FOR POSSIBLE BACTERIAL INFECTION / JAUNDICE

- Has the infant had convulsions?
- Has the infant's activity decreased ?
- Count the breaths in one minute. _____ breaths per minute
Repeat if elevated _____ Fast breathing?
- Look for severe chest indrawing.
- Look for nasal flaring.
- Look and listen for grunting.
- Look and feel for bulging fontanelle.
- Look for pus draining from the ear.
- Look at the umbilicus. Is it red or draining pus?
- Look for skin pustules. Are there 10 or more pustules or a big boil?
- Measure axillary temperature (if not possible, feel for fever or low body temperature):
37.5°C or more (or feels hot)?
Less than 35.5°C?
Less than 36.5°C but above 35.4°C (or feels cold to touch)?
- See if young infant is lethargic or unconscious
- Look at young infant's movements. Less than normal?
- Look for jaundice. Are the palms and soles yellow?

DOES THE YOUNG INFANT HAVE DIARRHOEA? Yes ___ No ___

- For how long? ___ Days
- Is there blood in the stool?
- Look at the young infant's general condition. Is the infant:
• Lethargic or unconscious?
• Restless and irritable?
• Look for sunken eyes.
• Pinch the skin of the abdomen. Does it go back:
Very slowly (longer than 2 seconds)?
Slowly?

THEN CHECK FOR FEEDING PROBLEM & MALNUTRITION

- Is there any difficulty feeding? Yes ___ No ___
- Is the infant breastfed? Yes ___ No ___
If Yes, how many times in 24 hours? ___ times
- Does the infant usually receive any other foods or drinks? Yes ___ No ___
If Yes, how often?
- What do you use to feed the infant?
- Determine weight for age.
Very low ___ Low ___ Not Low ___

If the infant has any difficulty feeding, is feeding less than 8 times in 24 hours, is taking any other food or drinks, or is low weight for age AND has no indications to refer urgently to hospital: - - - - -

ASSESS BREASTFEEDING:

- Has the infant breastfed in the previous hour?
If infant has not fed in the previous hour, ask the mother to put her infant to the breast. Observe the breastfeed for 4 minutes.
 - Is the infant able to attach? To check attachment, look for:
 - Chin touching breast Yes ___ No ___
 - Mouth wide open Yes ___ No ___
 - Lower lip turned outward Yes ___ No ___
 - More areola above than below the mouth Yes ___ No ___

no attachment at all not well attached good attachment
 - Is the infant suckling effectively (that is, slow deep sucks, sometimes pausing)?
not suckling at all not suckling effectively suckling effectively
 - Look for ulcers or white patches in the mouth (thrush).
- Does mother have pain while breastfeeding?
If yes, then look for:
 - Flat or inverted nipples, or sore nipples
 - Engorged breasts or breast abscess

CHECK THE YOUNG INFANT'S IMMUNIZATION STATUS Circle immunizations needed today.

BCG DPT1
 OPV 0 OPV 1
 HEP-B 1

Return for next immunization on:

(Date)

ASSESS OTHER PROBLEMS:

Annexure III – Case Recording Form (Sick Child age 2 months up to 5 years)
MANAGEMENT OF THE SICK CHILD AGE 2 MONTHS UP TO 5 YEARS

Name: _____ Age: _____ Weight: _____ kg Temperature: _____ °C
ASK: What are the child's problems? _____ Initial visit? ___ Follow-up Visit? ___
ASSESS (Circle all signs present) **CLASSIFY**

<p>CHECK FOR GENERAL DANGER SIGNS</p> <p><i>sign present?</i></p> <p>NOT ABLE TO DRINK OR BREASTFEED LETHARGIC OR UNCONSCIOUS</p> <p>VOMITS EVERYTHING</p>	<p><i>General danger</i></p> <p>Yes ___ No ___</p> <p>Remember to use danger sign</p>																		
<p>DOES THE CHILD HAVE COUGH OR DIFFICULT BREATHING? Yes ___ No ___</p> <p><input type="checkbox"/> For how long ? _____ Days <input type="checkbox"/> Count the breaths in one minute</p> <p>_____ breaths per minute. Fast breathing?</p> <p><input type="checkbox"/> Look for chest indrawing.</p> <p><input type="checkbox"/> Look and listen for stridor.</p>																			
<p>DOES THE CHILD HAVE DIARRHOEA ? Yes ___ No ___</p> <p><input type="checkbox"/> For how long ? _____ Days <input type="checkbox"/> Look at the child's general condition. Is the child:</p> <p><input type="checkbox"/> Is there blood in the stool? Lethargic or unconscious?</p> <p><input type="checkbox"/> Restless and irritable</p> <p><input type="checkbox"/> Look for sunken eyes.</p> <p>fer the child fluid. Is the child:</p> <p>Not able to drink or drinking poorly?</p> <p>Drinking eagerly, thirsty?</p> <p>nch the skin of the abdomen. Does it go back:</p> <p>Very slowly (longer than 2 seconds)?</p>																			
<p>DOES THE CHILD HAVE FEVER? (by history/feels hot/ temperature 37.5°C or above) Yes ___ No ___</p> <p>Decide Malaria Risk: High Low</p> <p><input type="checkbox"/> Fever for how long? ___ Days <input type="checkbox"/> Look or feel for stiff neck.</p> <p><input type="checkbox"/> If more than 7 days, has fever <input type="checkbox"/> Look and feel for bulging fontanelle.</p> <p>been present every day? <input type="checkbox"/> Look for runny nose</p> <p><input type="checkbox"/> Has the child had measles within Look for signs of MEASLES:</p> <p>the last 3 months? <input type="checkbox"/> Generalized rash</p> <p>of these: cough, runny nose, or red eyes</p>																			
<p>if the child has measles now <input type="checkbox"/> Look for mouth ulcers</p> <p>DOES THE CHILD HAVE AN EAR PROBLEM Yes ___ No ___</p> <p><input type="checkbox"/> Is there ear pain? <input type="checkbox"/> Look for pus draining from the ear.</p> <p><input type="checkbox"/> Is there ear discharge? <input type="checkbox"/> Feel for tender swelling behind the ear.</p> <p>If Yes, for how long? _____ Days</p>																			
<p>THEN CHECK FOR MALNUTRITION <input type="checkbox"/> Look for visible severe wasting.</p> <p>for oedema of both feet.</p> <p>Determine weight for age.</p>																			
<p>THEN CHECK FOR ANAEMIA</p> <p>Look for palmar pallor.</p>																			
<p>CHECK THE CHILD'S IMMUNIZATION, PROPHYLACTIC VITAMIN A & IRON-FOLIC ACID STATUS</p> <p>Circle immunizations and Vitamin A or IFA supplements needed today.</p> <table style="width: 100%; border-collapse: collapse;"> <tr> <td style="border-bottom: 1px solid black; width: 15%;">BCG</td> <td style="border-bottom: 1px solid black; width: 15%;">DPT 1</td> <td style="border-bottom: 1px solid black; width: 15%;">DPT 2</td> <td style="border-bottom: 1px solid black; width: 15%;">DPT 3</td> <td style="border-bottom: 1px solid black; width: 15%;">DPT4</td> <td style="border-bottom: 1px solid black; width: 15%;">DT</td> </tr> <tr> <td style="border-bottom: 1px solid black;">OPV 0</td> <td style="border-bottom: 1px solid black;">OPV 1</td> <td style="border-bottom: 1px solid black;">OPV 2</td> <td style="border-bottom: 1px solid black;">OPV 3</td> <td style="border-bottom: 1px solid black;">OPV4</td> <td style="border-bottom: 1px solid black;">IFA</td> </tr> <tr> <td></td> <td style="border-bottom: 1px solid black;">HEP-B 1</td> <td style="border-bottom: 1px solid black;">HEP-B 2</td> <td style="border-bottom: 1px solid black;">HEP-B 3</td> <td style="border-bottom: 1px solid black;">MEASLES</td> <td style="border-bottom: 1px solid black;">VITAMIN A</td> </tr> </table>	BCG	DPT 1	DPT 2	DPT 3	DPT4	DT	OPV 0	OPV 1	OPV 2	OPV 3	OPV4	IFA		HEP-B 1	HEP-B 2	HEP-B 3	MEASLES	VITAMIN A	<p>Return for next immunization or vitamin A or IFA supplement on:</p> <p>_____ (Date)</p>
BCG	DPT 1	DPT 2	DPT 3	DPT4	DT														
OPV 0	OPV 1	OPV 2	OPV 3	OPV4	IFA														
	HEP-B 1	HEP-B 2	HEP-B 3	MEASLES	VITAMIN A														
<p>ASSESS CHILD'S FEEDING if child has VERY LOW WEIGHT or ANAEMIA or is less than 2 years old</p> <p><input type="checkbox"/> Do you breastfeed your child? Yes ___ No ___</p> <p>If Yes, how many times in 24 hours? ___ times. Do you breastfeed during the night? Yes ___ No ___</p> <p><input type="checkbox"/> Does the child take any other food or fluids? Yes ___ No ___</p> <p>If Yes, what foods or fluids? _____</p> <p>How many times per day? ___ times. What do you use to feed the child and how? _____</p> <p>How large are the servings? _____</p> <p>Does the child receive his own serving? _____ Who feeds the child and how? _____</p> <p><input type="checkbox"/> During this illness, has the child's feeding changed? Yes ___ No ___</p> <p>If Yes, how?</p>																			

ASSESS OTHER PROBLEMS:

Annexure IV

ORGANIZATION OF OSCE

Please note:

- *Only the non-italicized portions are to be printed and placed on the stations as instructions for the student. The italicized portions are instructions for examiners to plan out the OSCE session.*
- *Allot marks accordingly so that it is easy to assess. All stations need not carry equal marks. There may be negative marking too for wrong answers.*
- *Each station is for 3 minutes and then students rotate on the ring of a bell. Allow at each round only 7 students to take up stations and exclude station 7 (remember station 6 and 7 are linked).*
- *At each station provide a chair for the student. In observed stations provide additional chairs as needed. Place each station sufficiently spaced. If the hall is not very big you can use two rooms.*
- *Keep a separate time keeper.*
- *Some of the photographs mentioned in the stations can also be xeroxed and enlarged from IMNCI Photograph booklet.*
- *The stations and their organization described in this document are just some samples. One could modify and actually keep a real patient with clinical signs for assessment and then develop a structured assessment form for each observed station. Number of stations can be increased as also rest stations if there are more OSCE stations.*

STATION 1 (Unobserved Station)

This 2 year old has diarrhea for 5 days. There is no blood in stools.

1. Look at the adjoining photograph and comment on:
 - a. Eyes
 - b. Skin pinch

(Instruction for examiner: Place two photographs – one with skin pinch and the other with either normal or very slow skin pinch)

2. WRITE YOUR CLASSIFICATION FOR DEHYDRATION

STATION 2 (Unobserved station)

Look at the photograph of this young infant who is breast feeding.

1. Write the signs of attachment you see and comment on the attachment
 2. Write the signs of positioning you see and comment on position
- (Instruction for examiner: Place a photographs which shows only some correct

attachment and position signs)

STATION 3 (observed station – to collect the forms)

This 18 month child weighs 7 kg. There is no edema.

Look at the

- PHOTOGRAPH
- WEIGHT FOR AGE CHART

FILL the findings in the assessment Form provided

CLASSIFY the child's nutritional status in the appropriate column.

PLEASE HAND OVER THE COMPLETED FORM OF THIS STATION TO THE EXAMINER.

(Instruction for examiner: Place a photograph, which shows SEVERE WASTING/NO WASTING and also a copy of the weight for Age chart on the table. Also place adequate number of copies of xeroxed portion of the assessment form depicting only the CHECK FOR MALNUTRITION portion as depicted below for each student to fill)

ASSESS (Circle all signs present)

CLASSIFY

THEN CHECK FOR MALNUTRITION

- Look for visible severe wasting.
- Look and feel for oedema of both feet.
- Determine weight for age.
Very Low ___ Not Very Low ___

STATION 4 (Unobserved station)

This 11 month old child has Measles. She has no general danger signs or mouth ulcers.

1. LOOK AT THE PHOTOGRAPH AND write down your finding(s)
(Place a photograph showing corneal clouding)

2. WRITE YOUR CLASSIFICATION OF MEASLES

STATION 5 REST STATION

STATION 6 (Unobserved station)

Anita is 11 months old. She is assessed for feeding.
Her mother says she breast feeds Anita as often as she wants. She gives her some thin dal with rice twice a day. She gives her half a cup at each feed.

Fill the Assessment form provided and in the Feeding Problems column write down the problems identified.

PLEASE KEEP THIS FORM WITH YOU TILL YOU HAVE COMPLETED THE NEXT STATION. YOU WILL USE THIS INFORMATION IN THE NEXT STATION.

(Instruction for examiner: Place adequate number of copies of xeroxed portion of the assessment form ASSESSES CHILD'S FEEDING depicted below for each student to fill)

<p>ASSESS CHILD'S FEEDING if child has ANAEMIA OR VERY LOW WEIGHT or is less than 2 years old.</p> <ul style="list-style-type: none">• Do you breastfeed your child? Yes ___ No ___ If Yes, how many times in 24 hours? ___ times. Do you breastfeed during the night? Yes ___ No ___• Does the child take any other food or fluids? Yes ___ No ___ If Yes, what food or fluids? _____ How many times per day? ___ times. What do you use to feed the child? How large are servings? _____ Does the child receive his own serving? ___ Who feeds the child and how?• During the illness, has the child's feeding changed? Yes _ No__ If Yes, how?	Feeding Problems:
--	-------------------

STATION 7 (Observed station)

COUNSELLING STATION

THIS IS ANITA'S MOTHER. USE THE INFORMATION YOU HAVE FROM ANITA'S FEEDING ASSESSMENT IN THE PREVIOUS STATION TO NOW COUNSEL ANITA'S MOTHER FOR FEEDING

(Instruction for examiner: You can use a dummy mother (a PG or Intern) to sit here. The examiner observes the counseling and ticks for each student as per format provided below. Please collect the assessment form completed by the student at the previous station at this station once counseling is over.)

Assessment form: use the columns to enter roll no and tick where appropriate. Each correct scores 1 mark

<i>Criteria (marks)</i>					
1. Praises mother (1)					
2. Counsels about increasing frequency (1)					
3. Counsels about consistency of weaning feeds (1)					
4. Counsels about quantity of food (1)					
5. Asks checking questions (1)					

STATION 8 (Unobserved station)

This 4-year-old child from low risk malaria area is classified as MALARIA. He has a temperature of 3⁸°C. The peripheral blood smear is positive for P. Vivax.

WRITE THE ANTI-MALARIAL TREATMENT

(Instruction for examiner: Place a copy of the chart booklet so that student can search out the appropriate treatment and write it down.)

Flow of OSCE Stations

