



Research article

Capacity building among frontline health workers (FHWs) in screening for cardiovascular diseases (CVDs): Findings of an implementation study from Bihar, India

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Supplementary I. Checklists for various skill ascertainment of FHWs.

Checklist for availability of logistics for Community Based NCD screening.

Family folder form	Yes []	No []
CBAC form	Yes []	No []
Non-stretchable measuring tape	Yes []	No []
Job-aids for counselling	Yes []	No []

Checklist for 1st home visit.

Filled all the details of all family members in the family folder:	Yes []	No []
Filled CBAC forms for all persons aged ≥ 30 years:	Yes []	No []
Informed regarding importance of NCDs:	Yes []	No []
Informed regarding importance of NCD screening:	Yes []	No []
Informed regarding modifiable risk factors of NCD:	Yes []	No []
Informed regarding non-modifiable risk factors of NCD:	Yes []	No []
Used job-aids (i.e., module) during counselling:	Yes []	No []
Able to calculate risk score of participants from CBAC form:	Yes []	No []
Referred all the persons aged ≥ 30 years for NCD screening:	Yes []	No []
Prioritised high-risk persons in NCD screening:	Yes []	No []

Checklist for follow-up home visit.

Checked drug compliance of NCD diagnosed patients:	Yes []	No []
Counselled regarding importance of drug compliance:	Yes []	No []
Explained importance of follow-up visit to doctor:	Yes []	No []
Motivated for 150 minutes physical activity or yoga per week:	Yes []	No []
Motivated for salt restriction in diet:	Yes []	No []
Motivated for oil restriction in diet:	Yes []	No []
Used job-aids (i.e., module) during counselling:	Yes []	No []

Checklist for logistics availability for weekly NCD clinics.

Weighing machine	Yes []	No []
Height measurement tool/ stadiometer	Yes []	No []
Non-stretchable measuring tape	Yes []	No []
Blood pressure machine	Yes []	No []
Glucometer machine	Yes []	No []
Glucometer strips	Yes []	No []
Lancet/ needle	Yes []	No []
Cotton/ alcohol swab	Yes []	No []
Gloves/ Handwashing facility	Yes []	No []
Tablet for data entry on NCD portal	Yes []	No []
Internet connection for data syncing	Yes []	No []

Checklist for NCD portal skill.

Able to open NCD portal	Yes []	No []
Able to log in on NCD portal	Yes []	No []
Able to enter family folder in NCD portal	Yes []	No []
Able to enter CBAC form in NCD portal	Yes []	No []
Able to sync data in NCD portal	Yes []	No []
Able to retrieve data in NCD portal	Yes []	No []
Able to check due-list in NCD portal	Yes []	No []

Checklist for weight measurement.

- | | | |
|--|---------|--------|
| 1. Weighing scale kept at a flat surface: | Yes [] | No [] |
| 2. Calibrated the weighing scale: | Yes [] | No [] |
| 3. Asked participant to remove heavy objects like shoes, winter clothing's, head gear | Yes [] | No [] |
| 4. Asked participant to stand at centre of the scale with slight gap between the feet: | Yes [] | No [] |
| 5. Asked participant too look straight: | Yes [] | No [] |
| 6. Looked at the reading from above: | Yes [] | No [] |

Checklist for height measurement.

- | | | |
|--|---------|--------|
| 1. Made the participant stand on a flat surface | Yes [] | No [] |
| 2. Made the participant stand against the stadiometer or wall | Yes [] | No [] |
| 3. Asked participants to remove headgear and shoes: | Yes [] | No [] |
| 4. Correctly positioned the participant with 4 points touching the wall or stadiometer:
(back of head, shoulder, lower back, ankle) | Yes [] | No [] |
| 5. Asked participant to look straight with slight gap between the feet: | Yes [] | No [] |
| 6. Kept a cardboard or hardboard register above head of the participant: | Yes [] | No [] |
| 7. Looked at the reading from above: | Yes [] | No [] |

Checklist for waist circumference measurement.

- | | | |
|---|---------|--------|
| 1. Used non-stretchable measuring tape: | Yes [] | No [] |
| 2. Asked participant to stand and look straight with slight gap between two feet: | Yes [] | No [] |
| 3. Asked participant to reveal abdominal part or remove heavy clothing: | Yes [] | No [] |
| 4. Put the measuring tape at the level of umbilicus: | Yes [] | No [] |
| 5. Checked for fit (not too tight, not too loose): | Yes [] | No [] |
| 6. Checked alignment of the tape all around the participant: | Yes [] | No [] |
| 7. Measured waist circumference at the end of normal exhalation: | Yes [] | No [] |

Checklist for blood pressure measurement.

- | | | |
|---|---------|--------|
| 1. Asked the participant whether they have done following in past 30 minutes: | | |
| 1.1. Consumed Tea/Coffee | Yes [] | No [] |
| 1.2. Smoked | Yes [] | No [] |
| 1.3. Heavy exercise | Yes [] | No [] |
| 1.4. Consumed alcohol | Yes [] | No [] |
| 2. Asked whether the participant need to empty the bladder | Yes [] | No [] |

3. Position of the participant while measuring:
 - 3.1. Seated Yes [] No []
 - 3.2. Back supported Yes [] No []
 - 3.3. Feet resting firmly on the floor Yes [] No []
 - 3.4. Feet not crossed Yes [] No []
4. Position of the arm
 - 4.1. Supported from elbow till palm Yes [] No []
 - 4.2. At the level of the heart Yes [] No []
 - 4.3. Palm facing up Yes [] No []
5. Placement of the cuff:
 - 5.1. 2–3 cm/ 2 finger above the antecubital fossa Yes [] No []
 - 5.2. Covering brachial artery Yes [] No []
 - 5.3. Edge of the cuff is not restricted by clothing Yes [] No []
 - 5.4. Checked for fit (not too tight, not too loose) Yes [] No []
6. Documentation of reading:
7. Asked the participant not to move Yes [] No []
8. Asked the participant not to talk Yes [] No []
9. Clicked the START/STOP button Yes [] No []
10. Checked and documented reading after 30–45 seconds Yes [] No []

Checklist of random blood sugar measurement.

1. Explained the procedure to the participant: Yes [] No []
2. Checked availability of lancet, test stripes and functional glucometer Yes [] No []
3. Put on gloves/ washed hands prior to testing: Yes [] No []
4. Cleaned the participants finger to be pricked with cotton: Yes [] No []
5. Insert the test strip in glucometer: Yes [] No []
6. Hold and pricked the finger of the participant with lancet/ needle: Yes [] No []
7. Confirmed that the machine is ready for the test: Yes [] No []
8. Discarded the first drop then applied the second drop of blood to the test strip: Yes [] No []
9. Asked participant to lightly press pricked finger with cotton: Yes [] No []
10. Recorded and documented the test result: Yes [] No []
11. Properly disposed generated wastes Yes [] No []



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