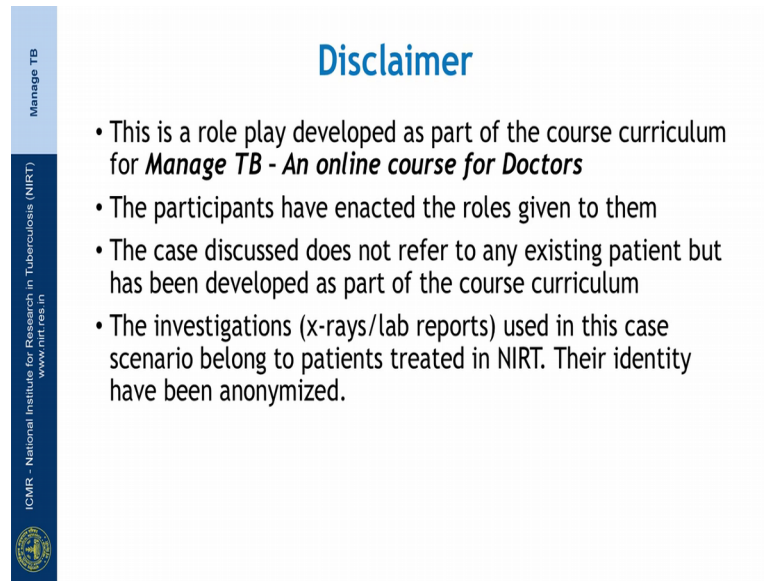


Manage TB
National Institute for Research in Tuberculosis, Chennai

Lecture - 45
Case discussion-Approach to management of TB in pregnancy

(Refer Slide Time: 00:11)



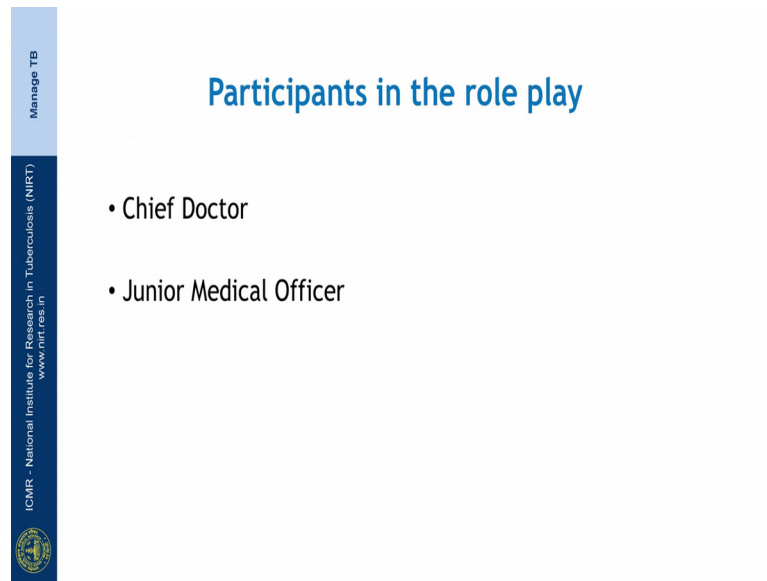
Disclaimer

- This is a role play developed as part of the course curriculum for *Manage TB - An online course for Doctors*
- The participants have enacted the roles given to them
- The case discussed does not refer to any existing patient but has been developed as part of the course curriculum
- The investigations (x-rays/lab reports) used in this case scenario belong to patients treated in NIRT. Their identity have been anonymized.

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The investigations such as x-rays and lab reports used in this case scenario belongs to patients treated at National Institute for Research in Tuberculosis, Chennai, their identity have been anonymized.

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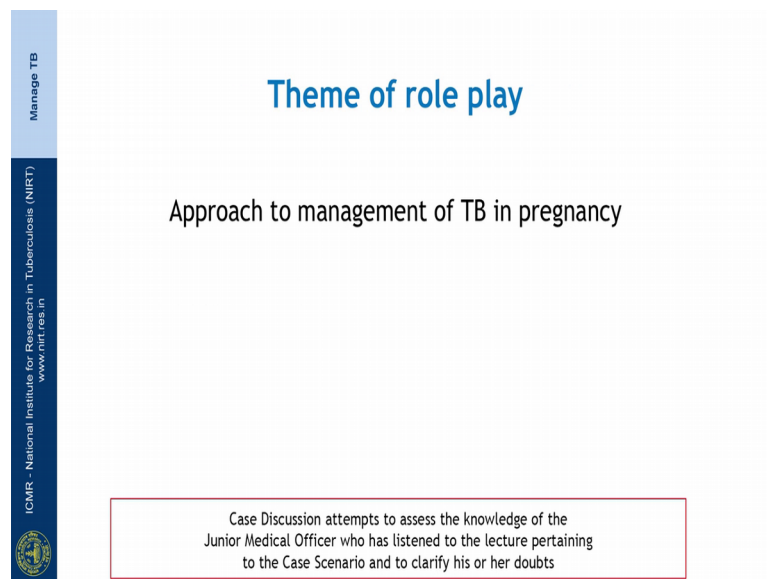
Manage TB

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Participants in the role play

- Chief Doctor
- Junior Medical Officer

(Refer Slide Time: 01:00)



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Theme of role play

Approach to management of TB in pregnancy

Case Discussion attempts to assess the knowledge of the Junior Medical Officer who has listened to the lecture pertaining to the Case Scenario and to clarify his or her doubts

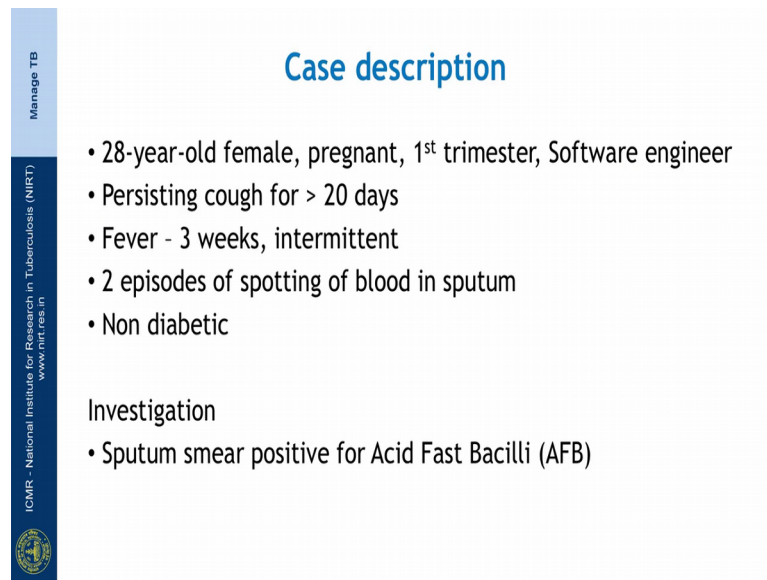
Good morning madam.

Good morning Pratheeksha.

Ma'am I have case for discussion can we start now?

Yeah, yes you can go ahead.

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The slide is titled "Case description" in blue text. On the left side, there is a vertical blue bar containing the text "Manage TB" at the top, "ICMR - National Institute for Research in Tuberculosis (NIRT)" in the middle, and "www.nirt.ias.ac.in" at the bottom. Below the text in the bar is a small circular logo. The main content of the slide is a bulleted list of symptoms and investigation results.

- 28-year-old female, pregnant, 1st trimester, Software engineer
- Persisting cough for > 20 days
- Fever - 3 weeks, intermittent
- 2 episodes of spotting of blood in sputum
- Non diabetic

Investigation

- Sputum smear positive for Acid Fast Bacilli (AFB)

Ma'am this is about a 20 year old pregnant lady; she is in a first trimester, she is a software engineer, she has a complains of persistence cough from more than 20 days she has fever of 3 weeks which is intermittent.

She has 2 episodes of spotting of blood in sputum, she is non-diabetic and sputum smear is positive for acid fast bacilli and expert results have just now come, ma'am; MTB detected and it is sensitive to rifampicin.

(Refer Slide Time: 01:35)

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Xpert MTB/RIF test result

The screenshot shows a 'Test Report' for Xpert MTB/RIF. The patient's name is 'IBAHANRITCHENNAUNDA'. The test type is 'Sputum'. The result is 'MTB DETECTED MED/CRU' and 'RIF RESISTANCE NOT DETECTED'. Below this, there is a table for 'Test and Analyte Result' with columns for Analyte, Ct, Cmpct, Analyte Result, and Check. The table lists several probes (Probe D, C, B, A, SPC) and controls (QC-1, QC-2) with their respective Ct values and results (POS, NEG, NA, PASS). At the bottom, there is a section for 'User' (Iahinda), 'Status' (Done), 'Span Time' (27/10/17 13:07:18), 'Expiration Date' (19/06/19), 'S/N Version' (4.0a), 'End Time' (27/10/17 18:40:02), 'Cartridge S/N' (654540161), 'Instruments S/N' (804274), 'Reagents Lot ID' (39711), 'Module S/N' (83880), 'Module Name' (A3), and 'Error Status' (OK). The footer indicates 'For In Vitro Diagnostic Use Only' and 'GeneXpert® Dx System Version 4.0a'.

Analyte	Ct	Cmpct	Analyte Result	Check
Probe D	22.1	154	POS	PASS
Probe C	28.7	219	POS	PASS
Probe B	21.8	137	POS	PASS
Probe A	22.1	119	POS	PASS
SPC	25.3	307	NA	PASS
Probe A	20.2	103	POS	PASS
QC-1	0.0	0	NEG	PASS
QC-2	0.0	0	NEG	PASS

Have you collected anymore information?

Yeah ma'am, I have asked her about any past anti-TB treatment, but she said she has not taken any treatment, she is non reactive for HIV, she has no other concomitant illness and is not on medications any other medications, she is not a diabetic, she is pregnant for 10 weeks ma'am.

Then?

And I have examined her she weighs around 38 kg, she is not an any not jaundice and there is no pedal arena.

So, what treatment for TB would you like to prescribe for this patient?

She is newly diagnosed TB.

Yes.

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Treatment of drug sensitive TB

Type of TB Case	Intensive phase	Continuation phase
New TB patent	2 months	4 months
[No or <1month of previous TB treatment]	Isoniazid Rifampicin Ethambutol Pyrazinamide	Isoniazid Rifampicin Ethambutol

RNTCP guidelines, 2016

She does not have any previous treatment history and she is sensitive to rifampicin. So, I would like to start her with 6 month daily regimen for the 2 months will be intensive phase and 4 month will be the continuation phase. During the intensive phase she will receive isoniazid, rifampicin, pyrazinamide and ethambutol and during the continuation phase she will receive isoniazid, rifampicin and ethambutol

Good, but you said she is in the first trimester pregnancy. So, are these drug safe?

Yes ma'am, except streptomycin all other first line drugs are safe in pregnancy and for any person is during that 3 first line treatment if we become pregnant except streptomycin all other drugs can continued.

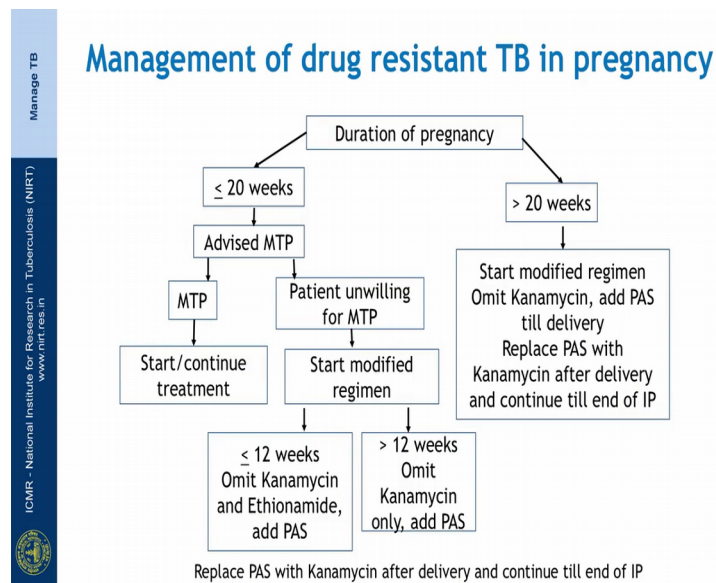
Good, what about the second line drugs?

Are they safe in pregnancy?

Ma'am it is better to avoid pregnancy while they are on second line TB treatment TB treatment, but we should council them that they should avoid pregnancy if they are on second line TB treatment, but; however, if the patient becomes pregnant and if the

pregnancy is less than 20 weeks of duration we should give them an option for medical termination of pregnancy; that is MTP and if they are willing to do MTP we can start restart the treatment after MTP.

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But if the patient is not willing for MTP then we have to if the pregnancy is less than 12 week then we have to substitute kanamycin and ethionamide with para aminosalicylic acid. And if it is more than 12 weeks only kanamycin alone can be omitted and substituted with para aminosalicylic acid. If the pregnancy is for some more than 20 weeks then kanamycin can be substituted for para aminosalicylic acid and after delivery kanamycin can be added to the regimen.

Yeah you are very well outline the management of TB in pregnancy.

Ok.

But how will you manage if in a mother who is lactating?

Ma'am we should ask them to continue the anti-TB medications along with breastfeeding also.

And in addition we must also counsel her.

Ok ma'am.

On cough hygiene.

Ok.

Not to cough on when she is feeding the baby.

Ok.

So that to avoid transmission.

Ok.

And also you must screen the new born.

Ok.

For active TB and also offer isoniazid prophylaxis once you rule out active treatment.

Ok ma'am.

So, now can you outline the most important points now?

Sure ma'am.

(Refer Slide Time: 04:43)



Key messages - Management of TB in pregnancy

- First line anti-TB drugs except streptomycin are safe in pregnancy
- Patient should be advised to avoid pregnancy while on anti-TB treatment
- Breast feeding should not be dis-continued during anti-TB treatment
- Cough hygiene should be advised in lactating woman with TB
- New born should be screened for active TB and offered isoniazid prophylaxis

First line anti-TB drugs streptomycin are safe in pregnancy. Patient should be avoided advised to avoid pregnancy while on anti-TB treatment.

Breast feeding should not be discontinued during anti-TB treatment. Cough hygiene should be advised in lactating woman with TB. New born should be screened for active TB and offered isoniazid prophylaxis.