

Common Breast Disorders II: Diagnosis and Management

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A 49 yoF presents complaining of unilateral straw-colored discharge from one nipple for the last six months. Physical exam of the breast is normal. Mammogram is negative.

What is your diagnosis? Intraductal Papilloma: Classic presentation is spontaneous, intermittent straw-colored or serosanguinous discharge from one nipple, typically in a perimenopausal woman. 75% of intraductal papillomas are located beneath the areola, usually microscopic but can grow to 2-3 mm (often soft, small, difficult to palpate). Important to identify if the discharge is expelled from a single duct or multiple openings – ↑ cancer risk if the discharge is expressed from multiple ducts.

What is the treatment of intraductal papilloma? Excisional biopsy of the duct and small amount of surrounding tissue. Associated with twofold increased risk of developing breast cancer.

A 34 yoF presents complaining of a bilateral nipple discharge that is milky in appearance for the last 4 months. Her youngest child is 4 years old. She also notes that her menses are irregular for the last year. On physical exam, you are able to express milky discharge from both breast. On microscopic evaluation of the discharge, adipose cells are seen.

What is your diagnosis? Galactorrhea. Common causes include functional hyperprolactinemia, primary hypothyroidism, prolactinomas, chronic breast stimulation (by the pt, her partner, or clothing), medications (OCPs, Phenothiazines), or chest wall neural stimulation such as post-thoracotomy syndrome.

What labs should be checked on this patient? UCG, serum prolactin level, TSH

Her UCG is negative and TSH is WNL. Prolactin level is elevated at 250. Repeat fasting level is 276. What needs to be obtained now?

MRI of the head to rule out CNS findings such as a prolactinomas + visual field exam.

The MRI is significant for 1.5 cm lesion of the pituitary gland consistent with a macroadenoma. What are treatment options? Normalize prolactin levels and inhibit growth with dopamine agonists: Bromocriptine, Pergolide, or Cabergoline. Consider surgery if significant symptoms unresponsive to medication use.

What algorithm is used to evaluate/manage patients with nipple discharge? Rule out galactorrhea and test nipple discharge for blood (occult blood with guaiac test). If the discharge is grossly bloody or guaiac positive, send for cytological evaluation, obtain MMG, and refer for surgery evaluation. If the discharge tests negative for blood, etiology is usually hormonal and MMG is not necessary.

What is your differential diagnosis in a woman with grossly bloody nipple discharge? Suggests that a lesion in the duct is bleeding → intraductal carcinoma, bleeding papillomata, fibrocystic changes with an active intraductal component.

How does this differential differ if the discharge is guaiac positive? Consider intraductal pathologies such as papillomas, plasma cell mastitis, or occasionally breast cancer.

What are some classic characteristics of a malignant breast lesion? single lesion, hard, immovable/fixed, irregular borders, size greater than 2cm. Mammographic features that suggest malignancy include: increased density, irregular margins, spiculation, accompanying clustered irregular microcalcifications.

How should you approach the management of a woman < 35 yo with complaints of a breast mass?
If your clinical breast exam is not suspicious for malignancy, repeat your exam within 3-10 days after her next menstruation. If mass persists, an ultrasound should be obtained (prefer ultrasound over mammogram secondary to woman under the age of 35 are most likely to have dense breast tissue which is better evaluated by ultrasound). If the mass is solid, fine needle biopsy, core needle biopsy, or excisional biopsy should be performed. If the mass is a simple cyst on ultrasound, no invasive evaluation is indicated but close followup is recommended.

How would your approach differ in a woman > 35 yo with the same complaints and findings? A MMG should be performed as part of the initial evaluation.

References:

Glass's Office Gynecology
Comprehensive Gynecology
www.uptodate.com