When using a portable ultrasound bladder scanner to assess the PVR urine volume, health care professionals should be aware of the possibility of a falsely elevated PVR. Any difference or discrepancy between the results of the bladder scanner and the in-and-out catheter should alert the health care professional to look for cystic and pelvic pathology, which can present as falsely high PVR volumes.

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Competing interests
None declared

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References

A woman took normal doses of codeine following childbirth, but her body converted more codeine into the active metabolite morphine than expected. Genetic testing indicated that she was an ultrarapid metabolizer of the drug. This resulted in high levels of morphine in her breast milk and lethal levels in her newborn.1

Pharmacogenetics is the interaction between drugs and one’s genetic makeup. The clinical application of pharmacogenetic testing is limited. It is not practical to prescreen every patient for whom codeine is prescribed. Most women metabolize codeine at the normal rate and its use while breastfeeding is considered safe.

Bottom line. It is recommended that all nursing mothers using codeine minimize duration of therapy and monitor their babies for signs of respiratory depression. Genetic testing for drug metabolizer genes is not standard practice, but might be considered following severe adverse drug reactions.

The complete Gene Messenger—Codeine Metabolism by the GenetiKit research team is available on CFPlus.* Past Gene Messenger articles can be accessed on-line at www.cfp.ca. On the homepage, click on Collections in the left-hand menu, then click on Genetics.

Competing interests
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The GenetiKit research team, a group of family physicians, genetic counselors and geneticists, designed the Gene Messenger series to provide practical information to help family physicians and their patients make informed choices about rapidly emerging genetic discoveries. The series is a collection of up-to-date, definitive, short reviews on genetics topics that have made headlines, and offers recommendations regarding referral for genetic services or testing.

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Reference
1. Priest L. Codeine can turn toxic in nursing mothers. Globe and Mail. 2006 May 10;Sect.A:1

For more information on genetics topics, see www.mtsinai.on.ca/FamMedGen/

The Gene Messenger on codeine metabolism is available at www.cfp.ca. Go to the full text of this article on-line, then click on CFPlus in the menu at the top right-hand side of the page.