

PAIN MANAGEMENT



PROVIDER EDUCATION RESOURCE

AYUMETRIX offers testing for pain management biomarkers to help maximize the effectiveness of analgesic drug use.

Managing chronic pain is a challenge for healthcare providers because of each patient's unique tolerance to pain, and differing reactions to prescribed medications. Unpleasant opioid side effects, such as nausea, vomiting, constipation and sedation, are common with pain management medication. The side effects can lead to work absences, poor work performance, the risk of job loss, and a diminished quality of life. An individual's genetic makeup may predispose them to adverse effects of pain and reduced efficacy of medications. Pharmacogenomics may help connect the dots towards mitigating adverse drug reactions among genetically-vulnerable individuals.

AYUMETRIX Pain Management Panel provides physicians with the genetic information they need to make the best possible selection of analgesic drugs and dosing regimens for patients. This intelligent approach to the prescription of pain management medications can drastically improve patient outcomes.

Why Test?

There are several common genetic variations that substantially reduce or increase the functionality of enzymes involved in metabolism of frequently prescribed pain management drugs. If a patient harbors one of these mutations it may have a dramatic impact on their ability to metabolize many commonly prescribed analgesics, resulting in reduced efficacy of the medication, or increased risk of adverse drug reactions.



Potential Benefits of Testing with the Pain Management Genetic Panel

- Decreased adverse drug reactions
- Reduced trial and error period for an effective medication
- Improved dosage recommendations for therapeutic effect

Gene Tests Included in the Pain Management Panel

Genetic Markers	EFFECT ON PAIN MANAGEMENT
CYP2D6	Key role in the metabolism of opioids including: codeine, tramadol, and oxycodone
CYP2C19	Impacts dosages requirements for tricyclic anti-depressants
CYP2C9	Crucial to the breakdown of NSAIDS including: dichlofenac, naproxen, and ibuprofen
COMT	Effects morphine dosage requirements and perceptions of pain

Limitations of Pharmacogenomics

Interactions with environmental elements and other medications need to be taken into consideration with the genetic makeup of the patient when determining efficacy of a drug. Rare genetic differences may not be detected because the panel screens for the most common and well documented gene variations.

Get started today

Make AYUMETRIX Genetic Testing Part of your Patient's Treatment Plan.

- Become a Provider
- Request Test Kits

Questions? Please contact our customer service team at 800-215-8898 or by email at info@ayumetrix.com This email address is being protected from spambots. We are available Monday through Friday, from 8:00 AM - 5:00 PM, Pacific Time.

For provider pricing information, please call us at

1-800-218-8898 or

info@ayumetrix.com



Selected References:

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