



EFFECTIVE DATE: 10|01|2015
POLICY LAST UPDATED: 04|04|2017

OVERVIEW

Patients who are prescribed chronic warfarin anticoagulation need ongoing monitoring that has generally taken place in a physician's office or anticoagulation clinic. Home prothrombin monitoring with a U.S. Food and Drug Administration (FDA)-approved device is proposed as an alternative to office or laboratory-based testing.

MEDICAL CRITERIA

Not applicable

PRIOR AUTHORIZATION

Not applicable

POLICY STATEMENT

BlueCHiP for Medicare and Commercial Products

At-home monitoring of chronic warfarin therapy may be considered medically necessary in patients who require continuous anticoagulation for chronic medical conditions. These conditions include, but are not limited to, patients with mechanical heart valves and chronic atrial fibrillation.

COVERAGE

Benefits may vary between groups/contracts. Please refer to the appropriate Benefit Booklet, Evidence of Coverage, or Subscriber Agreement for applicable coverage/benefits:

- G0248** covered under applicable office visit coverage
- G0249** covered under applicable lab coverage
- G0250** covered under applicable physician services with no co-payment

BACKGROUND

Warfarin is an effective anticoagulant for the treatment and prevention of venous and arterial thrombosis. Chronic warfarin therapy is recommended in all patients with mechanical heart valves and in some patients with chronic atrial fibrillation (i.e., patients with risk factors that indicate a higher likelihood of stroke). Patients with mechanical heart valves are frequently prescribed anticoagulants at higher levels than patients given anticoagulants for other indications, which puts them at higher risk of complications from warfarin therapy. Appropriate levels of warfarin anticoagulation are monitored with periodic prothrombin time measurements, as measured by the International Normalized Ratio (INR). For example, an INR result greater than 3 indicates a higher risk of serious hemorrhage, while an INR of 6 indicates an increased risk of developing a serious bleed nearly 7 times that of someone with an INR less than 3. In contrast, an INR less than 2 is associated with an increased risk of stroke. Therefore, monitoring of the prothrombin time is recommended to ensure that the prescribed dosing regimens result in INRs within the therapeutic range. Anticoagulation can be monitored: in the physician's office (usually once a month), at an anticoagulation clinic (usually once every 2 to 3 weeks), or at home.

In order for home prothrombin time monitoring to be effective, patients need to be appropriately trained and able to generate INR test results comparable to laboratory measures. Moreover, the clinical impact of home

prothrombin time monitoring is related to improved warfarin management. Specifically, home prothrombin time monitoring permits more frequent monitoring and self-management of warfarin therapy with the ultimate goal of 1) increasing the time that the anticoagulation is within a therapeutic INR range (intermediate health outcome); and 2) decreasing the incidence of thromboembolic or hemorrhagic events (final health outcome). Home self-monitoring is typically associated with some form of self-management of warfarin therapy. In some cases, the patient may be supplied with treatment algorithms and instructed to alter the dose based on the results of self-monitoring. In other cases, the patient may be instructed to provide the results of the self-monitoring (e.g., on the telephone or internet) and receive instructions on warfarin dosage.

In January 2007, the CoaguChek® XS System (patient self-testing) (Roche Diagnostics Corporation) was cleared for marketing by the FDA through the 510(k) process. The FDA determined that this device was substantially equivalent to existing devices, including the CoaguChek SX System (professional, cleared in 2006). Other than a labeling change, the device is identical to the professional version of the CoaguChek XS System. The patient self-testing system is intended for self-monitoring of prothrombin time in patients who are on a stable regimen of anticoagulation medications. Other devices cleared by the FDA for home prothrombin time monitoring include the ProTime® Microcoagulation System (International Technidyne Corporation) and the Alere™ (formerly Hemosense) INRatio® 2 PT/INR Monitoring System.

CODING

BlueCHiP for Medicare and Commercial Products

The following codes are separately reimbursed services:

- G0248** Demonstration, prior to initiation of home INR monitoring for patient with either mechanical heart valve(s), chronic atrial fibrillation, or venous thromboembolism who meets Medicare coverage criteria, under the direction of a physician; includes: face-to-face demonstration of use and care of the INR monitor, obtaining at least one blood sample, provision of instructions for reporting home INR test results, and documentation of patient ability to perform testing and report results
- G0249** Provision of test materials and equipment for home INR monitoring of patient with either mechanical heart valve(s), chronic atrial fibrillation, or venous thromboembolism who meets Medicare coverage criteria; includes: provision of materials for use in the home and reporting of test results to physician; testing not occurring more frequently than once a week; testing materials, billing units of service include 4 tests

The following code is a separately reimbursed service and should only be reported by physicians:

- G0250** Physician review, interpretation, and patient management of home INR testing for a patient with either mechanical heart valve(s), chronic atrial fibrillation, or venous thromboembolism who meets Medicare coverage criteria; testing not occurring more frequently than once a week; testing materials, billing units of service include 4 tests

ICD-10 Diagnosis Codes that may support medical necessity:



ICD 10 Med Nec
Diag Codes for Home

The following codes are intended to be used for laboratory services and physician interpretation of laboratory services only and are not for use with the G codes above. It is not appropriate to use the codes below for home prothrombin time monitoring, as the G codes are more specific. Anticoagulant services are intended to describe the outpatient management of warfarin therapy, including ordering, review and interpretation of INR testing, communication with patient and dosage adjustments as appropriate.

- 85610** Prothrombin time
- 99363** Anticoagulant management for an outpatient taking warfarin, physician review and interpretation of International Normalized Ratio (INR) testing, patient instructions, dosage adjustment (as needed),

and ordering of additional tests; initial 90 days of therapy (must include a minimum of 8 INR measurements) (Code deleted effective 12/31/2017)

99364 Anticoagulant management for an outpatient taking warfarin, physician review and interpretation of International Normalized Ratio (INR) testing, patient instructions, dosage adjustment (as needed), and ordering of additional tests; each subsequent 90 days of therapy (must include a minimum of 3 INR measurements) (Code deleted effective 12/31/2017)

93793 Anticoagulation management for a patient taking warfarin, must include review and interpretation of a new home, office, or lab international normalized ratio (INR) test result, patient instructions, dosage adjustment (as needed), and scheduling of additional test(s), when performed (New code effective 1/1/2018)

RELATED POLICIES

Not applicable

PUBLISHED

Provider Update, June 2017

Provider Update, June 2016

Provider Update, April 2015

Provider Update, June 2014

Provider Update, April 2013

Provider Update, April 2012

Provider Update, September 2011

REFERENCES

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3. Bloomfield HE, Krause A, Greer N et al. Meta-analysis: Effect of patient self-testing and self-management of long-term anticoagulation on major clinical outcomes. *Ann Intern Med* 2011; 154(7):472-82.
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5. Matchar DB, Jacobson A, Dolor R et al. Effect of home testing of international normalized ratio on clinical events. *N Engl J Med* 2010; 363(17):1608-20.
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7. Fitzmaurice DA, Murray ET, McCahon D et al. Self management of oral anticoagulation: randomised trial. *BMJ* 2005; 331 (7524):1057.
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