MEDICAL POLICY

SUBJECT: COMPUTERIZED MOTION DIAGNOSTIC IMAGING (CMDI)/GAIT ANALYSIS

POLICY NUMBER: 2.01.13
CATEGORY: Technology Assessment

EFFECTIVE DATE: 07/02/99
ARCHIVED: 01/11/01
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• If the member's subscriber contract excludes coverage for a specific service it is not covered under that contract. In such cases, medical policy criteria are not applied.
• Medical policies apply to commercial and Medicaid products only when a contract benefit for the specific service exists.
• Medical policies only apply to Medicare products when a contract benefit exists and where there are no National or Local Medicare coverage decisions for the specific service.

POLICY STATEMENT:

Based on our criteria and review of the peer reviewed literature, Computerized Motion Diagnostic Imaging (CMDI)/gait analysis is investigational for all indications.

Refer to Corporate Medical Policy #11.01.03 regarding Experimental and Investigational Services.

POLICY GUIDELINES:

The Federal Employee Health Benefit Program (FEHBP/FEP) requires that procedures, devices or laboratory tests approved by the U.S. Food and Drug Administration (FDA) may not be considered investigational and thus these procedures, devices or laboratory tests may be assessed only on the basis of their medical necessity.

DESCRIPTION:

Computerized Motion Diagnostic Imaging (CMDI) or gait analysis uses video recording combined with information from sensor devices such as surface or needle electromyography or foot pressure sensing plates to record and analyze coordinated muscle function. This technology is proposed for surgical planning, primarily for cerebral palsy, and for evaluation of work related athletic and automobile accident injuries, and back pain. Spinoscopy focuses on dynamic function of the muscles of the back.

RATIONALE:

A number of motion analysis systems, including the Peak Motus Motion Measurement System have received FDA 510k clearance. The Spinex International spinoscopy device received 510k clearance in 1988. The medical literature does not demonstrate the role of the technology in medical management or its impact on health incomes. Reports of single center experience suggest that gait analysis may alter decisions regarding the timing and choice of surgical interventions for children with spastic cerebral palsy, however no studies compare outcomes of surgery with and without the use of gait analysis for preoperative planning.

CODES: Number Description

Eligibility for reimbursement is based upon the benefits set forth in the member’s subscriber contract.

CODES MAY NOT BE COVERED UNDER ALL CIRCUMSTANCES. PLEASE READ THE POLICY AND GUIDELINES STATEMENTS CAREFULLY.

Codes may not be all inclusive as the AMA and CMS code updates may occur more frequently than policy updates.

Code Key: Experimental/Investigational = (E/I), Not medically necessary/ appropriate = (NMN).

CPT: 96000 (E/I) Comprehensive computer-based motion analysis by videotaping and 3-D kinematics

96001 (E/I) with dynamic plantar pressure measurements during walking

96002 (E/I) Dynamic surface electromyography, during walking or other functional activities, 1–12 muscles
96003 (E/I) Dynamic fine wire electromyography, during walking or other functional activities, 1 muscle

96004 (E/I) Review and interpretation by physician or other qualified health care professional of comprehensive computer-based motion analysis, dynamic plantar pressure measurements, dynamic surface electromyography during walking or other functional activities, and dynamic fine wire electromyography, with written report

**HCPCS:** No code(s)

**REFERENCES:**


*BlueCross BlueShield Association Technology Evaluation Center. Gait analysis for pediatric cerebral palsy. 2001 Apr;16(19).*


**KEY WORDS:**

Gait, Motion Analysis

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### CMS COVERAGE FOR MEDICARE PRODUCT MEMBERS

Based on our review, computerized motion diagnostic imaging is not addressed in National or Regional Medicare coverage determinations or policies.