

EFFECTIVE DATE: 09|01|2026

POLICY LAST REVIEWED: 05|20|2026

OVERVIEW

This policy document(s) the state-mandated coverage guidelines for biomarker testing (§ 27-19-81 and §27-20-77, full text below) and medical necessity of biomarker tests.

The Biomarker Testing Mandate applies to Commercial Products only. However, this policy addresses the medical necessity of services for both Medicare Advantage Plans and Commercial Products.

This policy addresses biomarker testing services:

- for which prior authorization is required for Medicare Advantage Plans and/or recommended for Commercial Products via the online authorization tool, or
- that are not medically necessary, or
- not covered, or
- covered

MEDICAL CRITERIA

Medical criteria may vary based on the service being rendered. Please refer to the Coding section for details.

Medical necessity criteria for services identified in the Coding section may be found:

1. In this policy (below) for the following 3 categories, when separate criteria is not identified for the specific test being requested (in either number 2 or 3), or
 - a. Carrier screening (preconception or prenatal testing) for genetic diseases
 - b. Genetic screening or testing for genetic or hereditary conditions
 - c. Genetic testing for cancer
2. In the online authorization tool, or
3. In a separate Medical Policy (see Related Policies section)

Generally, InterQual criteria is used to determine medical necessity for a majority of biomarker testing, and is found in the online authorization tool:

<https://www.bcbsri.com/BCBSRIWeb/Login.do?redirectTo=/providers/preauth/preauthProviderOverview.jsp>

NOTE REGARDING PANEL TESTING: Panel tests are subject to additional criteria. Please refer to the Policy Statement and Prior Authorization sections below for specific information regarding panel testing before utilizing the medical necessity criteria set forth below.

The following general criteria is used in the online authorization tool depending on the category of screening, when separate, more specific criteria is not identified for the test being requested.

Carrier screening (preconception or prenatal testing) for genetic diseases is considered medically when the following criteria are met:

- One or both individuals have a first- or second-degree relative (see definitions below) who is affected;
- One individual is known to be a carrier;

- One or both individuals are members of a population known to have a carrier rate that exceeds a threshold considered appropriate for testing for a particular condition; AND
- Previous carrier screening or individual targeted gene testing for the gene variant(s) of interest has not been performed.

First-degree relatives include a biological parent, brother, sister, or child.

Second-degree relatives include a biologic grandparent, aunt, uncle, niece, nephew, grandchildren, and half-sibling.

Genetic screening or testing for genetic or hereditary conditions is considered medically necessary when the diagnostic test of the individual's germline will benefit the individual and one of the following criteria is met:

- To confirm a suspected diagnosis in a patient with signs and/or symptoms of the condition
- To identify a causative etiology for a clinical syndrome, for which there are multiple possible underlying conditions
- Testing an asymptomatic individual to determine future risk of disease

Genetic testing for cancer is considered medically necessary when one of the following criteria is met:

- Testing an asymptomatic patient to determine future risk of cancer
- Therapeutic testing of cancer cells from an affected individual to benefit the individual by directing targeted treatment based on specific somatic variants.

PRIOR AUTHORIZATION

Prior authorization review may be recommended for some services for Commercial Products in accordance with the Biomarker Testing Mandate. Please refer to the Coding section.

Prior authorization review may be required for Medicare Advantage Plans. Please refer to the Coding section.

For services with prior authorization indicated in the attached code grids, prior authorization is required for Medicare Advantage Plans and recommended for Commercial Products.

Requests for authorization of biomarker testing should be submitted via the BCBSRI online prior authorization tool, which is available to BCBSRI-participating providers. All other providers may fax a prior authorization request to Utilization Management at (401) 272-8885.

If a biomarker test is not found in the online authorization tool, please fax the request to Utilization Management at (401) 272-8885.

Panel Testing

Prior authorization is required for each component and/or gene/gene variant of panel testing when the panel is represented by multiple CPT codes. Each individual CPT code must be entered into and processed through the online authorization tool independently.

Commercial Products

Effective 10/1/2025, for Fully-Funded Commercial Products only, prior authorization requests may not be needed when the requesting physician is a BCBSRI Contracted Primary Care Provider. See below for a list of specialties. Prior authorization continues to be needed for all other Commercial Products, including Self-Funded and Medicare Advantage Plans.

The following specialties, that are credentialed as a primary care provider, are included in this exemption:

- Internal Medicine
- Pediatric Medicine
- Family Practice
- Obstetrics and Gynecology

- Doctor of Osteopathic Medicine
- NP (Nurse Practitioner)/PCP (Primary Care Physician or Provider)
- PA (Physician Assistant)

POLICY STATEMENT

Commercial Products

Biomarker testing may be considered medically necessary for the purposes of diagnosis, treatment, appropriate management or ongoing monitoring of a member's disease or condition to guide treatment decisions, when the test provides clinical utility as demonstrated by medical and scientific evidence, in accordance with the Biomarker Testing Mandate, including, but not limited to:

- Labeled indications for an FDA-approved or -cleared test or indicated tests for an FDA-approved drug;
- Centers for Medicare Services (CMS) National Coverage Determinations (NCD) or Medicare Administrative Contractor (MAC) Local Coverage Determinations (LCD); or
- Nationally recognized clinical practice guidelines and consensus statements.

Some biomarker testing services are not medically necessary when:

- there is insufficient clinical evidence or strength of recommendation,
- results would not reasonably be used in management of a patient,
- services are unlikely to impact therapeutic decision-making in the clinical management of the patient.

Some genetic testing services are not covered and a contract exclusion for any self-funded group that has excluded the expanded coverage of biomarker testing related to the state mandate, R.I.G.L. §27-19-81 described below. For these groups, a list of which genetic testing services are covered with prior authorization, are not medically necessary or are not covered because they are a contract exclusion can be found in the Coding section of the Genetic Testing Services and Proprietary Laboratory Analyses policies. Please refer to the appropriate Benefit Booklet to determine whether the member's plan has customized benefit coverage. Please refer to the list of Related Policies for more information.

Medicare Advantage Plans

Some biomarker testing services are not covered for Medicare Advantage Plans when:

- there is insufficient clinical evidence or strength of recommendation,
- results would not reasonably be used in management of a patient,
- services are unlikely to impact therapeutic decision-making in the clinical management of the patient.

Medicare Advantage Plans and Commercial Products

For services in which prior authorization is indicated, biomarker testing may be considered medically necessary when the criteria in the online authorization tool and/or BCBSRI's Policy has been met. Please see Related Policies below for additional policies indicating criteria and coverage requirements for certain biomarker testing.

Panel Testing

There is not enough research to show that genetic panels can lead to better health outcomes for patients. When there is not enough research to show that a gene and/or gene variant alone in a genetic panel test may be useful for guiding patient management and to improve net health outcomes, then the entire genetic panel test is considered not covered for Medicare Advantage Plans and not medically necessary for Commercial Products.

For coverage of any panel test filed with a specific individual CPT code, please refer to the Coding section.

For some biomarker tests, medical necessity, and coverage of the test, is determined by the diagnosis code submitted with the claim. Please refer to the codes on the attached grid(s) and the information in the Comments column for diagnosis coding or for a Related Policy if applicable.

Laboratories are not allowed to obtain clinical authorization or participate in the authorization process on behalf of the ordering physician. Only the ordering physician shall be involved in the authorization, appeal or other administrative processes related to prior authorization/medical necessity.

In no circumstance shall a laboratory or a physician/provider use a representative of a laboratory or anyone with a relationship to a laboratory and/or a third party to obtain authorization on behalf of the ordering physician, to facilitate any portion of the authorization process or any subsequent appeal of a claim where the authorization process was not followed and/or a denial for clinical appropriateness was issued, including any element of the preparation of necessary documentation of clinical appropriateness. If a laboratory or a third party is found to be supporting any portion of the authorization process, BCBSRI will deem the action a violation of this policy and severe action will be taken up to and including termination from the BCBSRI provider network. If a laboratory provides a laboratory service that has not been authorized, the service will be denied as the financial liability of the participating laboratory and may not be billed to the member.”

COVERAGE

Benefits may vary between groups/contracts. Please refer to the appropriate Benefit Booklet, Evidence of Coverage, or Subscriber Agreement for laboratory testing/benefits and not medically necessary/not covered benefits/coverage.

BACKGROUND

§27-19-81 Nonprofit Hospital Service Corporations, Coverage for biomarker testing.

§27-20-77 Nonprofit Medical Service Corporations, Coverage for biomarker testing.

(a) *As used in this section:*

(1) *"Biomarker" means a characteristic that is objectively measured and evaluated as an indicator of normal biological processes, pathogenic processes, or pharmacologic responses to a specific therapeutic intervention. Biomarkers include, but are not limited to, gene mutations or protein expression.*

(2) *"Biomarker testing" is the analysis of a patient's tissue, blood, or other biospecimen for the presence of a biomarker. Biomarker testing includes, but is not limited to, single-analyte tests, multi-plex panel tests, and whole genome sequencing.*

(3) *"Clinical utility" means the test result provides information that is used in the formulation of a treatment or monitoring strategy that informs a patient's outcome and impacts the clinical decision. The most appropriate test may include both information that is actionable and some information that cannot be immediately used in the formulation of a clinical decision.*

(4) *"Consensus statements" as used here are statements developed by an independent, multidisciplinary panel of experts utilizing a transparent methodology and reporting structure and with a conflict of interest policy. These statements are aimed at specific clinical circumstances and base the statements on the best available evidence for the purpose of optimizing the outcomes of clinical care.*

(5) *"Nationally recognized clinical practice guidelines" as used here are evidence-based clinical practice guidelines developed by independent organizations or medical professional societies utilizing a transparent methodology and reporting structure and with a conflict of interest policy. Clinical practice guidelines establish standards of care informed by a systematic review of evidence and an assessment of the benefits and costs of alternative care options and include recommendations intended to optimize patient care.*

(b) *Every individual or group health insurance contract, or every individual or group hospital or medical expense insurance policy, plan, or group policy delivered, issued for delivery, or renewed in this state on or after January 1, 2024, shall provide coverage for the services of biomarker testing in accordance with each health insurer's respective principles and mechanisms of reimbursement, credentialing, and contracting. Biomarker testing must be covered for the purposes of diagnosis, treatment,*

appropriate management, or ongoing monitoring of an enrollee's disease or condition to guide treatment decisions, when the test provides clinical utility as demonstrated by medical and scientific evidence, including, but not limited to:

- (1) Labeled indications for an FDA-approved or -cleared test or indicated tests for an FDA- approved drug;*
- (2) Centers for Medicare Services ("CMS") national coverage determinations or Medicare Administrative Contractor ("MAC") Local Coverage Determinations; or*
- (3) Nationally recognized clinical practice guidelines and consensus statements.*

(c) Coverage as defined in subsection (b) is provided in a manner that limits disruptions in care including the need for multiple biopsies or biospecimen samples.

(d) The patient and prescribing practitioner shall have access to clear, readily accessible and convenient processes to request an exception to a coverage policy of a health insurer, nonprofit health service plan, and health maintenance organization. The process shall be made readily accessible on the health insurers', nonprofit health service plans', or health maintenance organizations' website.

Molecular Pathology

Molecular pathology procedures are medical laboratory procedures involving the analyses of nucleic acid (ie, DNA, RNA) to detect variants in genes that may be indicative of germline (eg, constitutional disorders) or somatic (eg, neoplasia) conditions, or to test for histocompatibility antigens (eg, HLA). Code selection is typically based on the specific gene(s) that is being analyzed. Genes are described using Human Genome Organization (HUGO) approved gene names.

Genomic Sequencing Procedures and Other Molecular Multianalyte Assays

Genomic sequencing procedures (GSPs) and other molecular multianalyte assays are DNA and/or RNA sequence analysis methods that simultaneously assay multiple genes or genetic regions relevant to a clinical situation. They may target specific combinations of genes or genetic material, or they may assay the exome or genome. The technology typically used for genomic sequencing is massively parallel sequencing (MPS), (eg, next-generation sequencing [NGS]) although other technologies may be employed. GSPs are performed on nucleic acids from germline or neoplastic samples.

New genetic technology, such as NGS and chromosomal microarray, has led to the ability to examine many genes simultaneously. This in turn has resulted in a proliferation of genetic panels. Panels using next-generation technology are currently widely available, covering a broad range of conditions related to inherited disorders, cancer, and reproductive testing. These panels are intuitively attractive to use in clinical care because they can analyze multiple genes more quickly and may lead to greater efficiency in the workup of genetic disorders. It is also possible that newer technology can be performed more cheaply than direct sequencing, although this may not be true in all cases.

Newer sequencing techniques were initially associated with higher error rates than direct sequencing. While there are limited published data directly comparing the accuracy of NGS with direct sequencing, several publications have reported that the concordance between NGS and Sanger sequencing is greater than 99% for cancer susceptibility testing, inherited disorders, and hereditary hearing loss. Another potential pitfall is the easy availability of a multitude of genetic information, much of which has uncertain clinical consequences. Variants of uncertain significance are found commonly and in greater numbers with NGS than with direct sequencing.

Proprietary Laboratory Analyses (PLA)

PLA codes describe proprietary clinical laboratory analyses and can be provided either by a single ("sole-source") laboratory or licensed or marketed to multiple providing laboratories (eg, cleared or approved by the Food and Drug Administration [FDA]). These codes include advanced diagnostic laboratory tests (ADLTs)

and clinical diagnostic laboratory tests (CDLTs) as defined under the Protecting Access to Medicare Act (PAMA) of 2014.

PLA codes do not require adherence to CPT Category I Code Criteria or American Medical Association (AMA) review for clinical utility. Additionally, they may or may not be FDA approved. The standards for inclusion in this section are:

- The test must be commercially available in the United States for use on human specimens, and
- The clinical laboratory or manufacturer that offers the test must request the code.

When a PLA code is available to report a given proprietary laboratory service, that PLA code takes precedence. The service should not be reported with any other CPT code(s) and other CPT code(s) should not be used to report services that may be reported with that specific PLA code. PLA codes are contained in a Category I subsection of the Pathology/Laboratory CPT codes.

Multianalyte Assays with Algorithmic Analyses (MAAA)

Multianalyte Assays with Algorithmic Analyses (MAAAs) are procedures that utilize multiple results derived from assays of various types, including molecular pathology assays, fluorescent in situ hybridization assays, and non-nucleic acid based assays (eg, proteins, polypeptides, lipids, carbohydrates). Algorithmic analysis using the results of these assays as well as other patient information (if used) is then performed and typically reported as a numeric score(s) or as a probability. MAAAs are typically unique to a single clinical laboratory or manufacturer.

Panel Tests

A genetic panel is defined as a test that simultaneously evaluates multiple genes, as opposed to sequential testing of individual genes. This includes panels performed by next-generation sequencing (NGS), massive parallel sequencing, and chromosomal microarray analysis. The definition of a panel will not include panels that report on gene expression profiling, which generally do not directly evaluate genetic variants.

The intended use for these panels is variable, for example, for the diagnosis of hereditary disorders, a clinical diagnosis may be already established, and genetic testing is performed to determine whether this is a hereditary condition, and/or to determine the specific variant present. In other cases, there is a clinical syndrome (phenotype) with a broad number of potential diagnoses, and genetic testing is used to make a specific diagnosis. For cancer panels, there are also different intended uses. Some panels may be intended to determine whether a known cancer is part of a hereditary cancer syndrome. Other panels may include somatic variants in a tumor biopsy specimen that may help identify a cancer type or subtype and/or help select best treatment.

There is no standardization to the makeup of genetic panels. Panel composition is variable, and different commercial products for the same condition may test a different set of genes. The makeup of the panels is determined by the specific lab that developed the test. In addition, the composition of any individual panel is likely to change over time, as new variants are discovered and added to existing panels.

Genetic panels using next-generation technology or chromosomal microarray analysis are available for many clinical conditions. The major advantage of panels is the ability to analyze many genes simultaneously, potentially improving the breadth and efficiency of the genetic workup. A potential disadvantage of panels is that they provide a large amount of ancillary information whose significance may be uncertain. Limited published evidence has reported that the analytic validity of panels approaches that of direct sequencing. The clinical validity and clinical utility of panels are condition-specific. The clinical validity of panels will reflect the clinical validity of the underlying individual variants. The clinical utility of panels will depend on the context in which they are used, ie, whether the advantages of panel testing outweigh the disadvantages for the specific condition under consideration.

Genetic test panels are available for many clinical conditions. Genetic test panels may be focused to a few genes or include a large number of genes. The advantage of genetic test panels is the ability to analyze many

genes simultaneously, potentially improving the breadth and efficiency of the genetic workup. A disadvantage of genetic test panels is that the results may provide information on genetic variants that are of unclear clinical significance, or which would not lead to changes in patient management. These results may potentially cause harm by leading to additional unnecessary interventions and anxiety that would not otherwise be considered based on the patient's clinical presentation and/or family history.

Definitions

Genetic Testing

Genetic testing involves the analysis of chromosomes, DNA, RNA, genes, or gene products to detect inherited (germline) or noninherited (somatic) genetic variants related to disease or health.

Carrier Testing

A carrier of a genetic disorder has 1 abnormal allele for a disorder. When associated with an autosomal recessive or X-linked disorder, carriers of the causative variant are typically unaffected. When associated with an autosomal dominant disorder, the person has 1 normal copy of the gene and 1 mutated copy of the gene; such a person may be affected with the disorder, may be unaffected but at high risk of developing the disease later in life, or may remain unaffected because of the sex-limited nature of the disease.

Carrier testing may be offered to people: (a) who have family members with a genetic condition; (b) who have family members who are identified carriers; and (c) who are members of ethnic or racial groups known to have a higher carrier rate for a particular condition.

Germline Variants

Germline variants are present in the DNA of every cell of the body, from the moment of conception. They include cells in the gonads (testes or ova) and could, therefore, be passed on to offspring.

Somatic Variants

Somatic variations occur with the passage of time and are restricted to a specific cell or cells derived from it. If these variants are limited to cells that are not in the gonads, they will not be passed on to offspring.

Pharmacogenomics

Pharmacogenomics studies how a person's genetic makeup affects his or her body's response to drugs.

Limitations of Genetic Testing

- The testing methods may not detect all variants that may occur in a gene
- Genetic testing may identify variants of uncertain significance
- Genetic testing may not necessarily determine the clinical outcome
- Different genes can cause the same disease (genetic heterogeneity)
- A variant in a gene may cause different phenotypes (phenotypic heterogeneity)
- Some disease-causing genes may not yet be identified
- Genetic testing is subject to laboratory error

There are several tests with a lack of demonstrated clinical utility based on extremely limited published data and/or insufficient evidence demonstrating the clinical validity of the test. In these cases, the evidence is insufficient to determine the effect of the technologies on health outcomes and are therefore considered not medically necessary.

CODING

See the attached grid(s) for Medicare Advantage Plans and Commercial Products coverage of Biomarker Testing Codes and indication of which codes may be covered, medically necessary if criteria are met, not medically necessary or not covered.

[Genetic Testing Codes and Coverage](#)

[HCPCS Codes and Coverage](#)

[Multianalyte Assays with Algorithmic Analyses \(MAAA\) Codes and Coverage](#)

[Pathology and Laboratory Codes and Coverage](#)

[Proprietary Laboratory Analyses \(PLA\) Codes and Coverage](#)

RELATED POLICIES

Assays of Genetic Expression in Tumor Tissue as a Technique to Determine Prognosis in Patients with Breast Cancer

Biomarker Testing in Risk Assessment and Management of Cardiovascular Disease

Blood Product Molecular Antigen Typing

Bone Turnover Markers for Diagnosis and Management of Osteoporosis and Diseases Associates with High Bone Turnover

CA-125

Circulating Tumor DNA and Circulating Tumor Cells for Cancer Management (Liquid Biopsy)

Comprehensive Genomic Profiling for Selecting Targeted Cancer Therapies

Envisia for Idiopathic Pulmonary Fibrosis

Evaluation of Biomarkers for Alzheimer's Disease

Fecal Calprotectin Testing

Gene Expression Profile Testing and Circulating Tumor DNA Testing for Predicting Recurrence in Colon Cancer

Gene Expression Profiling and Protein Biomarkers for Prostate Cancer Management

Gene Expression Profiling for Cutaneous Melanoma

Genetic and Protein Biomarkers for the Diagnosis and Cancer Risk Assessment of Prostate Cancer

Genetic Testing for Diagnosis and Management of Mental Health Conditions

Genetic Testing for Duchenne and Becker Muscular Dystrophy

Genetic Testing for Epilepsy

Genetic Testing for Inherited Thrombophilia

Genetic Testing for Mitochondrial Disorders

Genomic Sequence Analysis in the Treatment of Hematolymphoid Diseases

Genomic Sequence Analysis in the Treatment of Solid Organ Neoplasms

Germline and Somatic Biomarker Testing (Including Liquid Biopsy) for Targeted Treatment and Immunotherapy in Breast Cancer

Homocysteine Testing in the Screening, Diagnosis, and Management of Cardiovascular Disease

Identification of Microorganisms Using Nucleic Acid Probes

Immune Cell Function Assay

In Vitro Chemoresistance and Chemosensitivity Assays

Intracellular Micronutrient Analysis

Invasive Prenatal (Fetal) Diagnostic Testing

Laboratory Testing Investigational Services

Laboratory Tests Post Transplant and for Heart Failure

Lung Liquid Biopsy

Lyme Disease Diagnosis and Treatment Mandate

Mass Spectrometry (MS) Testing in Monoclonal Gammopathy

Measurement of Serum Antibodies to Selected Biologic Agents

Medicare Advantage Plans National and Local Coverage Determinations

Minimal Residual Disease Testing for Cancer

Molecular Markers in Fine Needle Aspiration of the Thyroid

Molecular Testing for the Management of Pancreatic Cysts, Barrett Esophagus, and Solid Pancreaticobiliary Lesions

Molecular Testing in the Management of Pulmonary Nodules

Multicancer Early Detection Testing

Multimarker Serum Testing Related to Ovarian Cancer
Multitarget Polymerase Chain Reaction Testing for Diagnosis of Bacterial Vaginosis
Next Generation Sequencing for Solid Tumors
Noninvasive Techniques for the Evaluation and Monitoring of Patients with Chronic Liver Disease
Nutrient/Nutritional Panel Testing
Preimplantation Genetic Testing
Preventive Services for Commercial Members
Preventive Services for Medicare Advantage Plans
Prognostic and Predictive Molecular Classifiers for Bladder Cancer
Prostate Cancer Detection with IsoPSA
Proteogenomic Testing for Patients with Cancer
Proteomic Testing for Targeted Therapy in Non-Small-Cell Lung Cancer
Salivary Estriol as Risk Predictor Factor Preterm Labor and Management of Menopause and/or Aging
Serologic Genetic and Molecular Screening for Colorectal Cancer
Serum Biomarker Human Epididymis Protein 4
Serum Tumor Markers for Breast and Gastrointestinal Malignancies
Urinary Biomarkers for Cancer Screening, Diagnosis and Surveillance
Vitamin D Testing
Whole Exome and Whole Genome Sequencing for Diagnosis of Genetic Disorders

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Provider Update, January 2025
Provider Update, October 2023

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