



Medical policy updates

The following applies to Blue Care Network members:

- Noncovered services appear first; covered services follow.
- The effective date is indicated for the service, technology or procedure.

Noncovered services

Cryoablation of peripheral nerves (IOVERA® System)

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Procedure codes: *0440T, *0441T, *0442T**

There are many types of peripheral neuropathy, which can be brought on by diabetes, genetic predisposition (hereditary causes), exposure to toxic chemicals, alcoholism, malnutrition, inflammation (infectious or autoimmune), injury and nerve compression, and by taking certain medications such as those used to treat cancer and HIV/AIDS. Mild pain may sometimes be alleviated by over-the-counter analgesics such as nonsteroidal anti-inflammatory drugs or prescribed medications such as antidepressants, anticonvulsant medications or narcotic agents. Topically administered medications are another option for neuropathic pain. Two agents are topical lidocaine, an anesthetic agent, and capsaicin, a substance found in hot peppers that modifies peripheral pain receptors.

Cryoneurolysis is an alternative analgesic modality that uses extremely cold temperatures to reversibly ablate peripheral nerves. This technique has predominantly been used to treat chronic pain, although percutaneous probes, ultrasound guidance, and the recent development of a handheld cryoneurolysis device now enable a wider range of clinical applications. Cryoneurolysis has been used for treatment of lower back pain, neck pain, neuromas and intercostal neuralgia. It's being investigated as a possible treatment for peripheral neuropathies, neuromas as well as pain and symptoms of knee osteoarthritis and thoracotomy.

Cryoablation (for example, cryoneurolysis, cryoanalgesia) for the treatment of peripheral neuropathy is experimental. It hasn't been scientifically demonstrated to improve patient clinical outcomes.

Cryoablation treatment for peripheral neuropathy includes, but is not limited to, the following conditions:

- Peripheral neuropathy brought on by diabetes, genetic predisposition (hereditary causes), exposure to toxic chemicals, alcoholism, malnutrition, inflammation (infectious or autoimmune), injury and nerve compression, or by taking certain medications such as those used to treat cancer and HIV/AIDS
- Peripheral neuromas
- Post-thoracotomy/intercostal pain
- Total knee arthroplasty/osteoarthritis pain
- Chronic headaches (for example, migraine, tension, cluster, cervicogenic, occipital neuralgia)

In-office needle arthroscopy

- **New policy**
- **Effective date: Jan. 1, 2020**
- **Procedure codes: *29805, *29870**

(These codes are non-covered when performed in the physician's office.)

Surgical knee arthroscopy is one of the most commonly performed procedures in the United States. However, arthroscopy of the knee alone for diagnosis is not often performed, having been supplanted by magnetic resonance imaging. Most treatment decisions for internal knee pathology are based on physical examination and MRI, which may be supplemented by the history and plain radiographs. MRI of the knee is not an infallible diagnostic tool.



Medical policy updates *Cont.*

Traditional arthroscopy is a surgical procedure that exposes the patient to general anesthesia and the risks associated with operative intervention. Arthroscopy is the gold standard for diagnosing intra-articular knee pathology. A complete diagnostic arthroscopy includes visualization of all internal structures of the knee: the suprapatellar pouch, medial and lateral gutters, medial and lateral compartments, intercondylar notch and the posterior medial and posterior lateral compartments.

The mi-eye2™ technology is a small-bore 14-gauge needle and camera unit intended for in-office arthroscopy. The handheld arthroscope interfaces with a digital display via a USB port.

With respect to preparation of the patient, the knee is prepared with a topical antiseptic solution and local analgesic. The patient is awake for the procedure. The mi-eye 2 system is indicated for use in diagnostic and operative arthroscopic and endoscopic procedures to provide illumination and visualization of an interior cavity of the body through either a natural or surgical opening.

In-office needle arthroscopy (for example, mi-eye™ 2, VisionScope®) is experimental. Its use hasn't been scientifically demonstrated to improve patient clinical outcomes.

Covered services

Transcatheter aortic valve implantation for aortic stenosis

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Plan approval with clinical review**
- **Procedure codes: *33361-33369, *33999**

Transcatheter aortic valve implantation, or TAVI (also known as transcatheter aortic valve replacement), is a potential treatment for patients with severe aortic stenosis. Many patients with aortic stenosis are elderly or have multiple medical comorbidities, thus indicating a high, often prohibitive, risk for surgery.

TAVI is performed percutaneously, most often through the transfemoral artery approach. It can also be done through the subclavian artery approach and transapically using mediastinoscopy. Balloon valvuloplasty is first performed in order to open the stenotic area. This is followed by passage of a bioprosthetic artificial valve across the native aortic valve. The valve is initially compressed to allow passage across the native valve and is then expanded and secured to the underlying aortic-valve annulus. The procedure is performed on the beating heart without the need for cardiopulmonary bypass.

Transcatheter aortic valve replacement performed with an U.S. Food and Drug Administration-approved transcatheter heart valve system, performed via an approach consistent with the device's FDA-approved labeling, may be indicated for patients with aortic stenosis.

Inclusions:

Transcatheter aortic valve replacement with a device approved by the FDA and performed with an approach consistent with the device's FDA-approved labeling is established for patients with aortic stenosis when **all** of the following conditions are present:

- **One** of the following:
 - Severe aortic stenosis with a calcified aortic annulus
 - Failure (stenosed, insufficient, or combined) of a surgical bioprosthetic aortic valve



Medical policy updates *Cont.*

- New York Heart Association heart failure class II, III or IV symptoms
- Left ventricular ejection fraction greater than 20%
- **One** of the following:
 - Patient is not an operable candidate for open surgery, as judged by at least two cardiovascular specialists including a cardiac surgeon.
 - Patient is an operable candidate but is at high risk for open surgery (for example, Society of Thoracic Surgeons operative risk score $\geq 8\%$ or at a $\geq 15\%$ risk of mortality at 30 days).
 - Patient is at intermediate or greater surgical risk for open aortic valve replacement (only when used in accordance with FDA regulations for Sapien XT Transcatheter Heart Valve; see below).
 - Patient is at low surgical risk for open aortic valve replacement (only when used in accordance with FDA regulations for Sapien 3, Sapien 3 Ultra, CoreValve Evolut™ R or CoreValve Evolut PRO)

Edwards SAPIEN XT Transcatheter Heart Valve:

1. Severe aortic stenosis with a calcified aortic annulus and one or more of the following:
 - An aortic valve area of $\leq 1.0 \text{ cm}^2$ or aortic valve area index $\leq 0.6 \text{ cm}^2/\text{m}^2$
 - A mean aortic valve gradient $\geq 40 \text{ mmHg}$
 - A peak aortic-jet velocity $\geq 4.0 \text{ m/sec}$
 - Native anatomy appropriate for the 23, 26, or 29 mm valve system (between 18 and 28 mm)
2. New York Heart Association heart failure Class II, III or IV symptoms
3. Patient is not a candidate for open surgery, as judged by a heart team, including a cardiac surgeon, **or** to be at high or greater risk for open surgical therapy (Society of Thoracic Surgeons operative risk score $\geq 8\%$ or at a $\geq 15\%$ risk of mortality at 30 days)
4. Patient is at intermediate surgical risk for open aortic valve replacement (predicted risk of surgical mortality $\geq 3\%$ at 30 days based on the Society of Thoracic Surgeons risk score and other clinical comorbidities unmeasured by the STS Risk Calculator)

Edwards SAPIEN and Edwards SAPIEN 3 Ultra

Patient with severe aortic valve stenosis who is at low risk for death or major complications associated with open-heart surgery.

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LOTUS Edge™ Valve System

1. Aortic stenosis in patients with symptomatic heart disease due to severe native calcific aortic stenosis
 - An aortic valve area of $\leq 1.0 \text{ cm}^2$ or aortic valve area index $\leq 0.6 \text{ cm}^2/\text{m}^2$
2. Patient is not a candidate for open surgery, as judged by a heart team, including a cardiac surgeon, or is high or greater risk for open surgical therapy (predicted risk of surgical mortality $\geq 8\%$ at 30 days, based on the Society of Thoracic Surgeons risk score and other clinical comorbidities unmeasured by the STS risk calculator).

Medtronic CoreValve™ (Evolut) system:

1. Severe aortic stenosis with a calcified aortic annulus and one or more of the following:
 - An aortic valve area of $\leq 1.0 \text{ cm}^2$ or aortic valve area index $\leq 0.6 \text{ cm}^2/\text{m}^2$
 - A mean aortic valve gradient $\geq 40 \text{ mmHg}$
 - A peak aortic-jet velocity $\geq 4.0 \text{ m/sec}$
 - Native aortic annulus diameters between 23 and 31 mm
2. New York Heart Association heart failure Class II, III or IV symptoms
3. Patient with severe aortic valve stenosis who is at low risk or higher for death or major complications associated with open-heart surgery.

Exclusions:

Transcatheter aortic valve replacement is considered experimental for all other indications, including but not limited to:

- The individual is an appropriate candidate for the standard, open surgical approach but has refused
- Hypersensitivity or contraindication to an anticoagulation/antiplatelet regimen
- Presence of active bacterial endocarditis or other active infections
- The use of non-FDA-approved systems or approaches including
 - Portico, and JenaValve systems
 - Transcaval approach

Cont.



Medical policy updates *Cont.*

Relative contraindications

In some cases, the benefits of transcatheter aortic valve implantation may exceed potential risks. In such instances, the cardiologist should provide an attestation indicating that relative contraindications exist and that the patient fully understands all risks. While the items below are not absolute exclusions, the safety and effectiveness of transcatheter aortic valve implantation haven't been evaluated in patients with the following characteristics or comorbidities:

- Patients without aortic stenosis
- Untreated, clinically significant coronary artery disease requiring revascularization
- Cardiogenic shock manifested by low cardiac output, vasopressor dependence, or mechanical hemodynamic support
- Transarterial access not able to accommodate an 18-Fr sheath
- Sinus of valsalva anatomy that would prevent adequate coronary perfusion
- End-stage renal disease requiring chronic dialysis or creatinine clearance <20 cc/min
- Symptomatic carotid or vertebral artery disease
- Safety, effectiveness and durability have not been established for valve-in-valve procedures
- Non-calcified aortic annulus
- Severe ventricular dysfunction with ejection fraction < 20%
- Congenital unicuspid or congenital bicuspid aortic valve
- Mixed aortic valve disease (aortic stenosis and aortic regurgitation with predominant aortic regurgitation > 3+)
- Prosthetic ring in any position
- Severe mitral annular calcification, severe mitral insufficiency, moderate to severe mitral or tricuspid regurgitation or Gorlin syndrome
- Moderate to severe mitral stenosis
- Blood dyscrasias defined as: leukopenia, acute anemia (Hb < 9 g/dL), thrombocytopenia, history of bleeding diathesis or coagulopathy or hypercoagulable states
- Hypertrophic cardiomyopathy with or without obstruction
- Echocardiographic evidence of intracardiac mass, thrombus or vegetation

- Excessive calcification of vessel at access site
- Bulky calcified aortic valve leaflets in close proximity to coronary ostia

Note: The safety and effectiveness of the Medtronic CoreValve™ system have not been evaluated in the pediatric population.

Intravitreal corticosteroid implants

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Plan approval with clinical review**
- **Procedure codes: *67027, *67028, J7311, J7312, J7313, J7314**

An intravitreal implant is a drug delivery system, injected or surgically implanted in the vitreous of the eye, for sustained release of a pharmacologic agent to the posterior and intermediate segments of the eye.

Intravitreal implants deliver a continuous concentration of drug to the eye over a prolonged period. The goal of therapy is to reduce the inflammation in the eye while minimizing the adverse effects of the therapeutic regimen.

Corticosteroid implants can be biodegradable or non-biodegradable. Non-biodegradable systems are thought to be preferable for treating chronic, long-term disease, while biodegradable products may be preferred for conditions that require short-term therapy. Although the continuous local release of steroid with an implant may reduce or eliminate the need for intravitreal injections or long-term systemic therapy, surgical implantation of the device carries its own risks, and the device could increase ocular toxicity due to increased corticosteroid concentrations in the eye over a longer duration. With any route of administration, cataracts are a frequent complication of long-term corticosteroid therapy.

The safety and effectiveness of dexamethasone intravitreal and fluocinolone acetonide intravitreal implants have been established. They may be considered a useful therapeutic option when indicated.

All other uses of intravitreal implants are considered experimental.



Medical policy updates *Cont.*

Inclusions:

Fluocinolone acetonide intravitreal implant 0.59 mg (Retisert®) for the treatment of chronic non-infectious intermediate, posterior uveitis or panuveitis

- Fluocinolone acetonide intravitreal implant 0.18 mg (Yutiq) for the treatment of chronic non-infectious unueitis affecting the posterior segment of the eye
- Fluocinolone acetonide intravitreal implant 0.19 mg (Iluvien™) for the treatment of diabetic macular edema in patients who have previously been treated with a course of corticosteroids **and** did not have a clinically significant rise in intraocular pressure
- Dexamethasone intravitreal implant 0.7 mg (Ozurdex®) for the treatment of **any** of the following:
 - Non-infectious ocular inflammation, or uveitis, affecting the intermediate or posterior segment of the eye
 - Macular edema following branch or central retinal vein occlusion
 - Diabetic macular edema

Exclusions:

- A fluocinolone acetonide intravitreal implant 0.59 mg (Retisert®) or 0.19 mg (Iluvien®) or dexamethasone intravitreal implant 0.7 mg (Ozurdex™) is considered **investigational** for the treatment of:
 - Birdshot retinochoroidopathy
 - Cystoid macular edema related to retinitis pigmentosa
 - Idiopathic macular telangiectasia type 1
 - Postoperative macular edema
 - Circumscribed choroidal hemangiomas
 - Proliferative vitreoretinopathy
 - Radiation retinopathy
- All other uses of a corticosteroid intravitreal implant.

Light and laser therapy for vitiligo and atopic dermatitis

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Plan notification, Plan approval with clinical review**
- **Procedure codes: *96900, *96910, *96912, *96913, *96999**

There are numerous medical and surgical treatments aimed at decreasing disease progression or attaining repigmentation in vitiligo. First-line therapies include topical corticosteroids, alone or in combination with topical vitamin D3 analogs, topical calcineurin inhibitors, systemic steroids and topical antioxidants. Treatment options for vitiligo recalcitrant to first-line therapy include, among others, light box therapy with ultraviolet B (UVB) and psoralen plus ultraviolet A (PUVA).

First-line management of atopic dermatitis includes patient education, avoidance of triggering factors, hydration, treatment of flares through anti-inflammatory pharmacologic therapy and nonpharmacologic therapies aimed at compensation of the skin barrier defects. Phototherapy and photochemotherapy (for example, UVA, UVB and PUVA) are considered second-line modalities. Given that traditional therapies may not be effective and carry long-term side effects, artificial ultraviolet radiation has been investigated as a treatment adjunct or alternative to conventional treatments.

Targeted phototherapy includes the ability to use higher treatment doses and to limit exposure to surrounding tissue. Original UVB devices consisted of a Phillips TL-01 fluorescent bulb with a maximum wavelength (λ_{max}) of 311 nm. Subsequently, xenon chloride (XeCl) lasers and lamps were developed as targeted UVB treatment devices; they generate monochromatic or very narrow band radiation with a λ_{max} of 308 nm. Targeted phototherapy devices are directed at specific lesions or affected areas, thus limiting exposure to the surrounding normal tissues. They may therefore allow higher dosages compared with a light box, which could result in fewer treatments.

PUVA uses a psoralen derivative in conjunction with long wavelength ultraviolet A light (sunlight or artificial) for photochemotherapy of skin conditions. Psoralens are tricyclic furocoumarins that occur in certain plants and can also be synthesized. They are available in oral and topical forms.

Cont.



Medical policy updates *Cont.*

Oral PUVA is generally given 1.5 hours before exposure to UVA radiation. Topical PUVA therapy refers to direct application of psoralen to the skin with subsequent exposure to UVA light. With topical PUVA, UVA exposure is generally administered within 30 minutes of psoralen application.

Psoralen plus ultraviolet A (PUVA), narrowband ultraviolet B (NB-UVB), and targeted phototherapy with excimer laser, with or without the use of oral or topical medications for the treatment of vitiligo are considered established treatments. They may be useful therapeutic options when indicated.

Inclusions:

- Vitiligo that is not responsive to other forms of conservative therapy (for example, topical corticosteroids, coal/tar preparations).
- NB-UVB and excimer laser phototherapy in individuals ≥ 3 years of age.
- Topical PUVA can be performed in children ≥ 2 years of age when up to 20% of their body surface area is affected.
- Systemic PUVA or oral PUVA is restricted to children > 12 years who have widespread vitiligo ($\geq 20\%$ body surface area).
- Treatment of vitiligo is restricted to the face, neck, trunk and extremities.

Exclusions:

- Systemic PUVA or oral PUVA is contraindicated in children < 12 years of age.
- Treatment of vitiligo of the acral areas (fingers, palms, soles of feet) is excluded.
- Laser treatment for atopic dermatitis, contact dermatitis or other eczema is excluded.

Refractive keratoplasties, phototherapeutic keratectomy and implantation of intrastromal corneal ring segments

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Plan notification**
- **Procedure codes: L8699, *65710, *65760, *65765, *65767, *65770, *65771, *65772, *65775, *65785, S0800, S0810, S0812, *66999**

Refractive keratoplasty describes various procedures that modify the shape of the eye. When the shape of the eye, corneal discrepancies or aging of the lens interferes with bending light correctly (refractive error), blurred images are a result. Myopia (nearsightedness), hyperopia (farsightedness), presbyopia (loss of near vision with age) and astigmatism are the primary types of refractive errors. Corrective lenses (eyeglasses or contact lenses) provided the safest avenue for vision correction as they are not associated with medical complications when used as directed.

Refractive surgery aims to change the shape of the cornea permanently. Motives for seeking out refractive keratoplasty generally revolve around cosmetic issues and the desire to reduce dependency on eyeglasses or contact lenses. Refractive keratoplasty carries risk and therefore is promoted after conservative (eyeglasses and contact lenses) or medical therapy have failed. Certain cases of repair following surgically induced or traumatic injury, aphakia or keratoconus may be the exception.

Epikeratophakia (donor cornea is transplanted onto the anterior surface of the recipient's cornea) for the treatment of aphakia (absence of the eye lens) is an established procedure. It may be a useful therapeutic option when indicated.

Refractive procedures mentioned in this policy may be considered cosmetic and not medically necessary when used to correct myopia (nearsightedness), hyperopia (farsightedness), astigmatism (imperfection in the curvature of the cornea) or presbyopia (gradual loss of ability to focus on nearby objects, acquired with age). Individual contract language will apply.



Medical policy updates *Cont.*

Implantation of intrastromal corneal ring segments (Intacs®) is established for the treatment of keratoconus (cornea thins and begins to bulge into a cone-like shape). It may be a useful therapeutic option when indicated.

Implantation of intrastromal corneal ring segments (Intacs®) for the treatment of myopia (nearsightedness) is not medically necessary.

Keratophakia (placement of a donor cornea under the recipient's cornea) is experimental. It hasn't been scientifically demonstrated to be as safe and effective as conventional treatment.

Phototherapeutic keratectomy for treatment of recurrent corneal erosions is an established procedure. It may be a therapeutic useful option when indicated.

Inclusions:

- Epikeratophakia (donor cornea is transplanted onto the anterior surface of the recipient's cornea) for the treatment of aphakia (absence of the eye lens)
- Implantation of intrastromal corneal ring segments (Intacs®) for the treatment of keratoconus (cornea thins and bulges like a cone) is appropriate when all of the following criteria are met:
 - The patient has experienced a deterioration in his or her vision.
 - Corneal transplantation is the only alternative to improve the patient's functional vision.
 - The patient has a clear central cornea with a corneal thickness of 450 microns or greater at the proposed incision site.
- Phototherapeutic keratectomy is an established surgical modality for treatment of recurrent corneal erosions when non-operative methods have failed.

Exclusions:

- Refractive keratoplasty procedures for indications not listed above, including those that are cosmetic in nature
- Implantation of intrastromal corneal ring segments (Intacs®) for the treatment of myopia (nearsightedness) and all other conditions not listed above
- Keratophakia (placement of a donor cornea under the recipient's cornea)
- Phototherapeutic keratectomy for indications not listed above, including those that are cosmetic in nature

Stereotactic radiosurgery and stereotactic body radiotherapy

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Plan approval with clinical review**
- **Procedure codes: Multiple**

Stereotactic radiosurgery, or SRS, and stereotactic body radiotherapy, or SBRT, are techniques that use highly focused, conformal radiation beams to treat both neoplastic and non-neoplastic conditions. Although SRS and SBRT may be completed with one session (single fraction), SRS typically refers to a single-session procedure to ablate the target lesion. However, either technique may require additional sessions (typically not more than five) over a course of days, referred to as fractionated radiotherapy.

The safety and effectiveness of stereotactic radiosurgery and stereotactic body radiotherapy** using gamma-ray or linear-accelerator units are established and are considered useful therapeutic options when indicated.

Reference AIM criteria for clinical preference.

**** Note:** Platforms available for SRS and SBRT are distinguished by their source of radiation; they include gamma radiation from cobalt 60 sources, high-energy photons from LINAC systems, and particle beams (for example, protons). Particle beam (proton therapy) is not covered in this policy.

Inclusionary and exclusionary guidelines — Clinically based guidelines that may support individual consideration and pre-authorization decisions

Inclusions:

Stereotactic radiosurgery (intracranial) using a gamma-ray or linear-accelerator unit, also known as LINAC), is considered established for the following indications:

- Arteriovenous malformation
- Acoustic neuromas
- Pituitary adenomas
- Non-resectable, residual or recurrent meningiomas
- Craniopharyngiomas
- Glomus jugulare tumors



Medical policy updates *Cont.*

- Solitary or multiple brain metastases in patients having good performance status
- Primary or recurrent malignancies of the central nervous system, including but not limited to high-grade gliomas
- Trigeminal neuralgia refractory to medical management

Stereotactic body radiotherapy (extracranial) is considered established for the following indications:

- Spinal or vertebral body tumors that include:
 - Metastatic or primary
 - Irradiated or unirradiated
- Spinal or vertebral metastases that are radioresistant (for example, renal cell carcinoma, melanoma and sarcoma).
- Members with stage T1 or T2a non-small cell lung cancer (not larger than 5 cm) showing no nodal or distant disease and who are not candidates for surgical resection
- In the treatment of primary and metastatic liver malignancies
- Low- or intermediate-risk localized prostate cancer**
- For local treatment of advanced or recurrent pancreatic adenocarcinoma without evidence of distant metastasis
- Uveal melanoma
 - For treatment of melanoma of the choroid
- Lung metastatic disease when all the following apply:
 - Single metastatic lesion measuring ≤ 5 cm
 - Extrapulmonary disease is stable or volume of disease is low with remaining treatment options when one of the following apply:
 - Intent is either curative or palliative (for example, lesion is close to a major vessel and standard treatment could lead to hemoptysis or hemorrhage)
 - Treatment of a previously irradiated field
- Bone metastatic disease when both of the following apply:
 - Treatment of a previously irradiated field
 - Retreatment with external beam radiation therapy would result in significant risk of spinal cord injury

Stereotactic radiosurgery or stereotactic body radiotherapy using fractionation is considered established when used for indications listed above.

Note:

- Fractionated SRS refers to SRS or SBRT performed more than once on a specific site
- SBRT is commonly delivered over three to five fractions
- SRS is most often single-fraction treatment; however multiple fractions may be necessary when lesions are near critical structures.

** SBRT using proton beam therapy is acceptable for low and intermediate prostate cancer

Exclusions:

Stereotactic body radiotherapy is considered experimental for all other diagnoses not specified in this policy, including malignant neoplasms of the following:

- Kidney
- Adrenal glands

Stereotactic radiosurgery is considered experimental for the treatment of seizures and functional disorders (other than trigeminal neuralgia) including chronic pain and tremor.

Amniotic membrane and amniotic fluid

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Referral required**
- **Procedure codes: Multiple**

Several commercially available forms of human amniotic membrane and amniotic fluid can be administered by patches, topical application or injection. Amniotic membrane and amniotic fluid are being evaluated for the treatment of a variety of conditions, including chronic full-thickness diabetic lower extremity ulcers, venous ulcers, knee osteoarthritis, plantar fasciitis and ophthalmic conditions.

The safety and effectiveness of select human amniotic membrane products have been established. They may be useful therapeutic options when indicated.

Injection of amniotic fluid is experimental for all indications. The safety, effectiveness and improvement in health outcomes has not been scientifically demonstrated.



Medical policy updates *Cont.*

Inclusions

Treatment of nonhealing diabetic lower-extremity and venous stasis ulcers using the following human amniotic membrane products:

- AmnioBand® Membrane
- Biovance®
- Epifix®
- Grafix™

Note: Nonhealing is defined as less than a 20% decrease in wound area with standard wound care for at least two weeks

Human amniotic membrane grafts with or without suture (Prokera, AmbioDisk™) for the treatment of **any** of the following ophthalmic indications:

- Neurotrophic keratitis with ocular surface damage and inflammation that does not respond to conservative therapy^a
- Corneal ulcers and melts that do not respond to initial conservative therapy^a
- Corneal perforation when there is active inflammation after corneal transplant requiring adjunctive treatment
- Bullous keratopathy as a palliative measure in patients who are not candidates for curative treatment (for example, endothelial or penetrating keratoplasty)
- Partial limbal stem cell deficiency with extensive diseased tissue where selective removal alone is not sufficient
- Moderate or severe Stevens-Johnson syndrome
- Persistent epithelial defects that do not respond within two days to conservative therapy.^a
- Severe dry eye (DEWS 3 or 4)^b with ocular surface damage and inflammation that remains symptomatic after conservative therapy.^a
- Moderate or severe acute ocular chemical burn.

Human amniotic membrane grafts with suture or glue for the treatment of **any** of the following ophthalmic indications:

- Corneal perforation when corneal tissue is not immediately available
- Pterygium repair when there is insufficient healthy tissue to create a conjunctival autograft.

^a Conservative treatment is defined as use of topical lubricants and/or topical antibiotics and/or therapeutic contact lens and/or patching.

^b See policy guidelines for definition

Exclusions

All other human amniotic membrane products and indications **not outlined under inclusions**, including but not limited to:

- Grafts with or without suture for ophthalmic indications
- Injection of micronized or particulated human amniotic membrane for all indications, including but not limited to treatment of:
 - Osteoarthritis and plantar fasciitis
- Injection of human amniotic fluid for all indications
- Treatment of lower-extremity ulcers due to venous insufficiency

Policy guidelines

Dry eye severity level DEWS 3 to 4

Discomfort, severity and frequency — Severe frequent or constant

Visual symptoms — Chronic and/or constant, limiting to disabling

Conjunctival Injection — +/- or +/+

Conjunctive staining — Moderate to marked

Corneal staining — Marked central or severe punctate erosions

Corneal/tear signs — Filamentary keratitis, mucus clumping, Increase in tear debris

Lid/meibomian glands — Frequent

Tear film breakup time — < 5

Schirmer score (mm/5 min) — < 5



Medical policy updates *Cont.*

Sleep Disorders, Diagnosis and Medical Management

- **Revised policy**
- **Effective date: Jan. 1, 2020**

Due to the length of this medical policy, only recent updates to the policy are included in this article. Please reference the medical policy for complete information.

Obstructive sleep apnea, or OSA, syndrome results in repetitive episodes of upper airway obstruction. The most common symptoms in adults are snoring, excessive daytime sleepiness and hypertension.

Medical policy statement (new information to policy)

Diagnosis

The safety and effectiveness of an unattended sleep study with a minimum of three recording channels (using, at a minimum, the following sensors: nasal pressure with chest and abdominal respiratory inductance plethysmography and oximetry; or using Peripheral Arterial Tone with oximetry and actigraphy) in a home setting (home sleep study/home sleep apnea test) have been established. It may be considered a useful diagnostic option when indicated.

Noninvasive pulse oximetry as a sole test (as an **alternative** to polysomnography or as a cardiorespiratory study for diagnosing sleep related breathing disorders) is considered experimental. Its effectiveness has not been established.

Medical management

Positional therapy devices, such as the NightBalance Lunoa SPT system, are considered experimental. They haven't been proven to be more effective than standard care.

Inclusionary and exclusionary guidelines

Diagnosis

Unattended (unsupervised) home sleep study, with minimum of three recording channels (using, at a minimum, the following sensors: nasal pressure with chest and abdominal respiratory inductance plethysmography and oximetry; or using Peripheral Arterial Tone with oximetry and actigraphy)

Inclusions:

- Adult patients 18 years of age or older with high pretest probability for moderate to severe OSA
 - Observed apneas during sleep; **or**
 - A combination of **at least two** of the following:
 - Excessive daytime sleepiness evidenced by an Epworth sleepiness > 10, inappropriate daytime napping (for example, during driving, conversation or eating), or sleepiness that interferes with daily activities and is not explained by other conditions
 - Habitual snoring or gasping/choking episodes associated with awakenings
 - Treatment-resistant hypertension (persistent hypertension in a patient taking three or more antihypertensive medications)
 - Obesity, defined as a body mass index (BMI) > 35 kg/m² or neck circumference defined as > 17 inches in men or >16 inches in women
 - Craniofacial or upper airway soft tissue abnormalities
 - Unexplained nocturia [added as a criterion with this update]

Repeat unattended (unsupervised) home sleep study, with a minimum of three recording channels using, at a minimum, the following sensors: nasal pressure with chest and abdominal respiratory inductance plethysmography and oximetry; **or** using Peripheral Arterial Tone with oximetry and actigraphy)



Medical policy updates *Cont.*

Attended (supervised) sleep study performed in a sleep lab

Adults (18 years of age or older):

Inclusions:

- Adult patients 18 years of age or older with a moderate to high pretest probability for OSA
 - Observed apneas during sleep; **or**
 - A combination of **at least two** of the following:
 - Excessive daytime sleepiness evidenced by an Epworth sleepiness > 10, inappropriate daytime napping (for example, during driving, conversation or eating), or sleepiness that interferes with daily activities and is not explained by other conditions
 - Habitual snoring or gasping/choking episodes associated with awakenings
 - Treatment-resistant hypertension (persistent hypertension in a patient taking three or more antihypertensive medications)
 - Obesity, defined as a body mass index (BMI) > 35 kg/m² or neck circumference defined as > 17 inches in men or >16 inches in women
 - Craniofacial or upper airway soft tissue abnormalities
 - Unexplained nocturia [*added as a criterion with this update*]

Urinary biomarkers for cancer screening, diagnosis and surveillance

(Previous title: Urinary tumor markers for bladder cancer)

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **No referral required — Use appropriate contracted vendor**
- **Procedure codes: *86294, *86386, *88120, *88121**

The diagnosis of bladder cancer is generally made by cystoscopy and biopsy; cystoscopy, along with urine cytology, is performed periodically to identify recurrence. While urine cytology has a specificity of 90% to 100%, its sensitivity ranges from 50% to 60%. There is interest in urine biomarkers that might be used to supplement these tests. Urinary tumor marker tests have sensitivity ranging from 47% to 85% and specificity ranging from 53% to 95%. An analysis found that combining urinary tumor markers with cytology improves diagnostic accuracy. For individuals who have a history of bladder cancer, urinary tumor marker tests have sensitivity ranging from 46% to 84% and specificity ranging from 71% to 91%.

Screening for polyps is currently conducted by colonoscopy. A urine metabolite assay (PolypDx) for adenomatous polyps is at a very early stage of development. Current evidence does not support the diagnostic accuracy of urinary tumor markers to screen asymptomatic individuals for precancerous polyps.

The safety and effectiveness of FDA-approved urinary tumor markers for bladder cancer have been established. It may be considered a useful diagnostic option when used as an adjunct to cytology and cystoscopy.

The use of urinary tumor markers in screening for precancerous colonic polyps is experimental. There is insufficient evidence in the peer-reviewed medical literature to determine the effects of this technology on health outcomes.

Inclusionary and exclusionary guidelines (Clinically based guidelines that may support individual consideration and pre-authorization decisions)



Medical policy updates *Cont.*

Inclusions:

The assessment of FDA-approved urinary tumor markers for bladder cancer, as an adjunct to cytology and cystoscopy, is considered indicated in:

- The diagnosis of urinary bladder malignancy in members at very high risk
- The follow-up of members with a history of urinary bladder malignancy when the measurements of these markers is deemed essential in making management decisions

Exclusions:

- All other indications for bladder cancer not specified under the inclusions

The peer reviewed medical literature has not demonstrated the clinical utility of Cxbladder™; therefore, Cxbladder tests are considered experimental.

Heart-kidney transplant combined

- **New policy**
- **Effective date: Jan. 1, 2020**
- **Plan approval with clinical review**
- **Procedure codes: *33945, *50360, *50365**

The number of patients undergoing heart and kidney transplantation, also known as HKTx, has increased in recent years, as well as the number of waitlisted patients for heart and kidney transplantation. While on the waitlist, the three-month mortality rate of HKTx-listed patients was observed to be 21% in dialysis-dependent patients and 7% in nondialysis-dependent patients with renal insufficiency. Analysis of the United Network for Organ Sharing registry showed similar mortality rates between heart transplantation- and HKTx-listed patients, but the five-year survival rates of HKTx recipients were higher than the survival rates of HTx recipients with renal insufficiency regardless of the pretransplant dialysis dependence status. Another analysis of the UNOS registry showed higher survival rates in HKTx recipients than in HTx recipients requiring pretransplant dialysis, and further analysis of the UNOS database provided an association between pre-HTx estimated glomerular filtration rate, or GFR, and end-stage renal disease, kidney transplantation and mortality for up to 10 years after HTx. A pre-HTx estimated GFR <60 mL/min per m² was associated with increased mortality after HTx. Thus, lower GFR portended higher renal risks and mortality after isolated HTx.

These findings suggest that concomitant heart failure and renal insufficiency warrants consideration for HKTx without necessitating dialysis dependence. In patients with pre-HTx renal dysfunction with abnormal GFR, one also needs to consider the increased risk of end-stage renal disease following HTx because of the cumulative effects of calcineurin inhibitor nephrotoxicity and the attendant increase in post-HTx mortality if end-stage renal disease develops.

The safety and effectiveness of a heart-kidney transplant have been established. It may be considered a useful therapeutic option for carefully selected patients with end-stage heart and kidney disease.

Inclusions:

Indications for combined heart-kidney transplant include, but are not limited to, progressive chronic heart and kidney disease unresponsive to other medical and surgical therapy. In general, patients are selected for combined heart-kidney transplant if one or more of the following apply:

- End-stage heart and kidney disease
- End stage heart disease and estimated glomerular filtration rate (eGFR) is 33 mL/minute or less, or preoperative evaluation of the kidney indicates the likelihood that the rate of progression of renal injury or dysfunction after single organ transplant is high
- End-stage heart disease not amenable to any other form of therapy and is associated with a life expectancy of six to 12 months

Exclusions:

- Significant systemic or multisystemic disease (other than cardiorenal failure)
- Pulmonary hypertension that is fixed as evidenced by pulmonary vascular resistance greater than 5 Woods units, or trans-pulmonary gradient greater than or equal to 16 mm/Hg.
- Severe pulmonary disease despite optimal medical therapy, not expected to improve with heart transplantation alone.



Medical policy updates *Cont.*

Potential contraindications for transplant/re-transplant:

Note: Final patient eligibility for transplant is subject to the judgment and discretion of the requesting transplant center.

Potential contraindications represent situations where proceeding with transplant is not advisable in the context of limited organ availability. Contraindications may evolve over time as transplant experience grows in the medical community. Clinical documentation supplied to the health plan should demonstrate that attending staff at the transplant center have considered all contraindications as part of their overall evaluation of potential organ transplant recipients and have decided to proceed.

- Known current malignancy, or history of recent malignancy
- Untreated systemic infection making immunosuppression unsafe, including chronic infection
- Other irreversible end-stage disease not attributed to heart or kidney disease
- Systemic disease that could be exacerbated by immunosuppression
- Psychosocial conditions or chemical dependency affecting ability to adhere to therapy as defined by the transplant program

All transplants must be prior authorized through the Human Organ Transplant Program

Lung/double lung and liver transplant combined

- **New policy**
- **Effective date: Jan. 1, 2020**
- **Plan approval with clinical review**
- **Procedure codes: *47133, *47135, *47140-47147, *32850, *32853-32856**

Combined transplantation of the lungs and liver is recommended for patients who would not be expected to survive sequential transplantation of the organs. This option should be considered for patients with end-stage lung and liver disease with acceptable long-term prognosis who have failed standard medical and surgical therapy.

In the combined double-lung and liver transplant, both the recipient's lungs and diseased liver are removed and replaced by the donor's lungs and liver. All thoracic and abdominal organs are obtained from a single donor by means of standard harvest techniques. Patients awaiting combined double lung and liver transplant are enrolled through the United Network for Organ Sharing Organ Procurement and Transplantation Network database.

Combined double lung and liver transplants have been established as clinically safe and effective for carefully selected patients with end-stage lung and liver disease when transplantation of a single organ is precluded by severe disease in the other organ system, such that the patient's prognosis after combined transplantation is felt to be better than with sequential transplantation.

Note: Liver transplants (cadaver or living-donor) are covered for the indications listed below when adolescents or adults have met the requesting transplanting center's selection criteria and one of the following.

1. Model of End-stage Liver Disease (MELD) score greater than 10
2. Approval for transplant received from the United Network for Organ Sharing (UNOS) Regional Review Board

Note: Lung transplants must meet United Network of Organ Sharing guidelines for lung allocation score greater than zero.



Medical policy updates *Cont.*

Inclusions:

Indications for combined lung-double lung and liver transplant include, but are not limited to, progressive chronic lung and liver disease unresponsive to other medical and surgical therapy. In general, patients are selected for combined lung-liver transplant if one or more of the following apply:

- A lung transplant is typically required for irreversible, chronic lung diseases for which there is no further medical or surgical therapy available and survival is limited.
- Bilateral lung transplantation is typically required when chronic lung infection disease is present (for example, associated with cystic fibrosis and bronchiectasis). Some, but not all, cases of pulmonary hypertension will require bilateral lung transplantation.
- A liver transplant is typically required for irreversibly damaged livers for which there is no further medical or surgical therapy available, prognosis is poor and end stage liver disease (for example, alcoholic liver disease, viral hepatitis, autoimmune hepatitis, protoporphyria, biliary cirrhosis, vascular disease, trauma or toxic reactions)
- End stage lung disease and end stage liver disease

Exclusions:

- Patients with coronary artery disease not amenable to percutaneous intervention or bypass grafting, or associated with significant impairment of left ventricular function
- Patients with colonized with highly resistant or highly virulent bacteria, fungi, or mycobacteria
- Patients with intrahepatic cholangiocarcinoma
- Patients with hepatocellular carcinoma that has extended beyond the liver
- Patients with ongoing alcohol or drug abuse as defined by the transplant program

Potential contraindications for transplant/retransplant:

Note: Final patient eligibility for transplant is subject to the judgment and discretion of the requesting transplant center.

Potential contraindications represent situations where proceeding with transplant is not advisable in the context of limited organ availability. Contraindications may evolve over time as transplant experience grows in the medical community. Clinical documentation supplied to the health plan should demonstrate that attending staff at the transplant center have considered all contraindications as part of their overall evaluation of potential organ transplant recipients and have decided to proceed.

- Known current malignancy, or history of recent malignancy
- Untreated systemic infection making immunosuppression unsafe, including chronic infection
- Other irreversible end-stage disease not attributed to liver or lung disease
- Systemic disease that could be exacerbated by immunosuppression
- Psychosocial conditions or chemical dependency affecting ability to adhere to therapy as defined by the transplant program

All transplants must be prior authorized through the Human Organ Transplant Program.



Medical policy updates *Cont.*

Moderate penetrance variants associated with breast cancer in individuals at high breast cancer risk

- **New policy**
- **Effective date: Jan. 1, 2020**
- **Plan approval with clinical review**
- **Procedure codes: *81406, *81408, *81479**

In 2016, researchers estimated breast cancer would be diagnosed in 252,710 women and 40,610 would die from the disease; a woman's lifetime risk is 12.4%. Breast cancers can be classified as sporadic, familial or hereditary. Most breast cancers, however, are sporadic (70% to 75%), occurring in women without a family history of the disease. Familial cancers (15% to 25%) aggregate within families but lack clearly discernable patterns of inheritance and are likely polygenic. Hereditary cancers have discernable inheritance patterns, often occur at younger ages, may be bilateral, and comprise between 5% and 10% of breast cancers.

The genes associated with a moderate penetrance of breast cancer include:

- The PALB2 gene (partner and localizer of BRCA2) encodes for a protein first described in 2006. The gene is located at 16p12.2[a] and has 13 exons.
- The CHEK2 (checkpoint kinase 2) gene is activated in response to DNA double-strand breakage and plays a role in cell-cycle control, DNA repair, and apoptosis.
- ATM (ataxia-telangiectasia mutated), located on chromosome 11q22.3, is associated with the autosomal recessive condition ataxia-telangiectasia syndrome.

The safety and effectiveness of testing for PALB2 variants for breast cancer risk assessment in adults have been established. It may be considered a useful diagnostic option when indicated.

Inclusions:

Testing for PALB2 variants for breast cancer risk assessment in adults who meet the following criteria:

- The individual meets criteria for genetic risk evaluation (BRCA testing).
- The individual has undergone testing for sequence variants in BRCA1 and BRCA2 with negative results.

Exclusions:

- Testing for PALB2 sequence variants in individuals who do not meet the criteria outlined above is considered experimental.
- Testing for CHEK2 and ATM variants in the assessment of breast cancer risk is considered experimental.

Genetic testing- molecular markers in fine needle aspirates (FNA) of the thyroid

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Plan approval with clinical review**
- **Procedure codes: *81345, *81445, *81479, *81545, *0018U, *0026U**

Fine needle aspiration of a thyroid lesion to identify which patients need to undergo surgery has diagnostic limitations and has led to the development of molecular markers in an attempt to improve the accuracy of patient selection.

Fine needle aspiration of the thyroid is currently the most accurate procedure to distinguish benign thyroid lesions and malignant ones, reducing the rate of unnecessary thyroid surgery for patients with benign nodules and triaging patients with thyroid cancer to appropriate surgery.

The use of either Afirma® Genomic Sequencing Classifier or ThyroSeq® v3 in fine needle aspirates of thyroid nodules with indeterminate cytologic findings (for example, Bethesda diagnostic category III [atypia/follicular lesion of undetermined significance] or Bethesda diagnostic category IV [follicular neoplasm/suspicion for a follicular neoplasm]) established in patients who have the following characteristics:

- Thyroid nodules without strong clinical or radiologic findings suggestive of malignancy
- In whom surgical decision-making would be affected by test results

The use of any of the following types of molecular marker testing or gene variant analysis in fine needle aspirates of thyroid nodules with indeterminate findings (Bethesda diagnostic category III [atypia/follicular lesion of undetermined significance] or Bethesda diagnostic category IV [follicular neoplasm/suspicion for a follicular neoplasm]) or suspicious findings (Bethesda diagnostic category V [suspicious for



Medical policy updates *Cont.*

malignancy)) to rule in malignancy to guide surgical planning for initial resection rather than a two-stage surgical biopsy followed by definitive surgery may be considered established:

- ThyroSeq® v3
- ThyraMIR microRNA/ThyrGeNEXT™
- Afirma BRAF after Afirma Genomic Sequencing Classifier
- Afirma MTC after Afirma Genomic Sequencing Classifier

Gene expression classifiers, genetic variant analysis, and molecular marker testing in fine needle aspirates of the thyroid not meeting criteria outlined above, including but not limited to use of RosettaGX® Reveal and single-gene TERT testing, are considered experimental.

KRAS, NRAS and BRAF variant analysis in metastatic colorectal cancer (including liquid biopsy)

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Plan approval with clinical review**
- **Procedure codes: *81275, 81276, *81403, *81404, *88363, *81311, *81210, *0111U, *86152, *86153**

Cetuximab (Erbix®[®], ImClone Systems) and panitumumab (Vectibix®[®], Amgen) are monoclonal antibodies that bind to the epidermal growth factor receptor (EGFR), preventing intrinsic ligand binding and activation of downstream signaling pathways vital for cancer cell proliferation, invasion, metastasis and stimulation of neovascularization.

The RAS-RAF-MAP kinase pathway is activated in the EGFR cascade. RAS proteins are G-proteins that cycle between active (RAS-GTP) and inactive (RAS-GDP) forms, in response to stimulation from a cell surface receptor such as EGFR, and act as a binary switch between the cell surface EGFR and downstream signaling pathways. The KRAS gene can harbor oncogenic mutations that result in a constitutively activated protein, independent of EGFR ligand binding, rendering antibodies to the upstream EGFR ineffective. Approximately 40% of CRC have KRAS mutations in codons 12 and 13 in exon 2.

Another proto-oncogene that acts downstream from KRAS is NRAS (neuroblastoma RAS viral (v-ras) oncogene homolog) which harbors oncogenic mutations in codons 12, 13, or 61 that result in constitutive activation of the EGFR-mediated pathway. These mutations are relatively rare compared with KRAS, detected in perhaps 2% to 7% of CRC specimens. A third proto-oncogene, BRAF, encodes a protein kinase, is involved in intracellular signaling and cell growth and is a principal downstream effector of KRAS. BRAF mutations occur in less than 10 to 15% of colorectal cancers and appear to be a marker of poor prognosis. KRAS and BRAF mutations are considered to be mutually exclusive.

Typically, the evaluation of RAS mutation status requires tissue biopsy. Circulating tumor DNA (ctDNA) testing is proposed as a non-invasive alternative. Detection of ctDNA is challenging because ctDNA is diluted by nonmalignant circulating DNA and usually represents a small fraction (<1%) of total ctDNA. Therefore, more sensitive methods than the standard sequencing approaches (for example, Sanger sequencing) are needed.

Circulating tumor cell testing, or CTC, assays usually start with an enrichment step that increases the concentration of CTCs, either by biologic properties (expression of protein markers) or physical properties (size, density, electric charge). CTCs can then be detected using immunologic, molecular or functional assays. CTCs are also known as liquid biopsies. A number of liquid biopsy tests related to targeted treatment of metastatic colorectal cancer have been developed.

The safety and effectiveness of KRAS, NRAS and BRAF mutation analyses have been established and may be considered a useful diagnostic option to predict nonresponse to anti-EGFR monoclonal antibodies cetuximab and panitumumab in the treatment of all patients with metastatic colorectal cancer. It is a useful therapeutic option when indicated.

KRAS, NRAS and BRAF variant analysis using circulating tumor DNA or circulating tumor cell testing (liquid biopsy) to guide treatment for patients with metastatic colorectal cancer is considered experimental.



Medical policy updates *Cont.*

Fecal calprotectin

- **Revised policy**
- **Effective date: Jan. 1, 2020**
- **Procedure code: *83993**

Inflammatory bowel disease, or IBD, is a chronic inflammatory condition typically associated with the symptoms such as diarrhea, defecation urgency and sometimes rectal bleeding and abdominal pain.

Making a diagnosis of IBD is associated with well-defined management changes. A typical diagnostic approach to IBD includes stool testing for enteric pathogens, blood tests (complete blood count, inflammatory markers) to evaluate disease severity, as well as small bowel imaging and endoscopy (upper GI, colonoscopy) with biopsies.

Fecal calprotectin is a calcium- and zinc-binding protein that is a potential marker of intestinal inflammation. Fecal calprotectin testing is proposed as a noninvasive test to diagnose inflammatory bowel disease. Other potential uses are to evaluate response to treatment for patients with IBD and as a marker of relapse.

Pediatric patients

The clinical utility of fecal calprotectin testing has been established for pediatric patients. It can be a useful option when used as an adjunctive non-invasive test for confirming a diagnosis or recurrence of inflammatory bowel disease and in determining if an endoscopy may be needed.

Adult patients

Fecal calprotectin testing has been established for the evaluation of patients when the differential diagnosis is inflammatory bowel disease or noninflammatory bowel disease (including irritable bowel syndrome) for whom endoscopy with biopsy is being considered.

Fecal calprotectin testing is considered experimental in the management of inflammatory bowel disease, including the management of active inflammatory bowel disease and surveillance for relapse of disease in remission.