

Clinical Policy: Laser Therapy for Skin Conditions

Reference Number: OH.CP.MP.123 <u>Coding Implications</u>

Date of Last Revision: 07/23 Revision Log

See <u>Important Reminder</u> at the end of this policy for important regulatory and legal information.

Policy Statement

In compliance with Ohio Medicaid, Buckeye Health Plan must ensure coverage of medically necessary procedures. The plan covers all the services in the amount, duration, and scope that is no less than that covered by FFS Ohio Medicaid and in accordance with 42 CFR 438.210, with limitations, exclusions, and clarifications provided in the Ohio Medicaid Managed Care Provider Agreement and the Ohio Administrative Code.

Procedure

- Buckeye Health Plan will not impose hard limits or restrictions on coverage of medically necessary services.
- Prior to making a determination regarding coverage of services and procedures, Buckeye Health Plan will conduct a medical necessity review for all requests to include non-covered services and any request for services over an established benefit(s).
- Buckeye Health Plan will ensure members under age 21 have access to services that are
 available in accordance with federal EPSDT requirements found at 42 U.S.C. 1396d(r).
 This would include medically necessary services covered by Ohio Medicaid as well as any
 medically necessary screening, diagnostic and treatment services available to Ohio
 Medicaid consumers.
- Providers can request prior authorization to exceed coverage or benefit limits for members under age 21.

Description

Targeted phototherapy utilizes non-ionizing ultraviolet radiation with therapeutic benefit. Phototherapy is an efficacious local therapy that provides several advantages to traditional and biologic systemic therapies. Excimer lasers are monochromatic 308 nm xenon chloride lasers that are approved to treat certain inflammatory skin diseases. This policy describes the medical necessity requirements for excimer laser based targeted phototherapy.

Policy/Criteria

- I. It is the policy of Buckeye Health Plan and health plans affiliated with Centene Corporation[®] that excimer laser based targeted phototherapy is **medically necessary** for the following indications after the failure of topical treatments:
 - **A.** Localized plaque psoriasis with <10% body surface area (BSA) involvement, individual lesions, or more extensive disease;
 - **B.** Vitiligo;
 - C. Atopic dermatitis;
 - **D.** Cutaneous T-cell lymphoma (e.g., mycosis fungoides/ Sézary Syndrome).



- II. It is the policy of Buckeye Health Plan and health plans affiliated with Centene Corporation® that the evidence is insufficient to draw conclusions regarding the efficacy of excimer laser targeted phototherapy for the following indications:
 - A. Patients with photosensitivity disorders;
 - **B.** For the treatment of all other conditions than those specified above.

Background

Targeted phototherapy uses a localized delivery of ultraviolet light to facilitate therapeutic relief of some conditions. Ultraviolet light is predominantly absorbed by skin DNA, leading to the generation of pyrimidine dimers, pyrimidine, and (6-4) photoproducts which are either repaired or marked for arrest or cell death through the cell's checkpoint machinery. Various spectra of ultraviolet A (UVA) and ultraviolet B (UVB) wavelengths are utilized to treat a varying array of inflammatory skin disorders, including narrowband, broadband, and excimer lasers, as well as combinations of UVA and UVB with topical, systemic, biologic, and chemotherapeutic regimens. Additionally, phototherapy is cost effective and avoids the immunosuppressive effects that often accompany traditional and biologic based systemic therapies.

Excimer lasers are monochromatic 308nm xenon chloride lasers that provide a safe and selective approach to treating dermatological conditions. Excimer lasers are associated with significant T-cell depletion, alterations in apoptosis-related molecules, reductions in proliferation indices, and immunomodulatory mechanisms. An early study by Feldman *et al* assessed the efficacy of excimer lasers for the treatment of mild to moderate psoriasis in a multicenter study. The authors noted that 84% of the patients reached the primary outcome of at least 75% improvement of their plaques within 1 month. Another study by Rodewald *et al* compared the excimer laser to a non-intervention, placebo cohort, as well as other standard topical treatments for psoriasis. The laser and topical calcipotriene had similar efficacies but both were more effective than topical tazarotene or fluocinonide and the time to achieve 75% improvement favored the excimer laser. Therefore, laser was comparable to or more effective than other standard treatments for psoriasis.

According to a joint updated guideline from the American Academy of Dermatology, National Psoriasis Foundation, the excimer laser is recommended for use in adults with localized plaque psoriasis (including palmoplantar psoriasis) <10% BSA, for individual lesions, or in patients with more extensive disease (recommendation based on consistent, good quality patient oriented evidence.) Excimer laser is also recommended in the treatment of scalp psoriasis in adults (based on inconsistent or limited-quality patient-oriented evidence.)¹³

The initial treatment dose of the excimer laser depends on the individual's skin type, plaque characteristics, and thickness, with subsequent doses adjusted in accordance to the patient's clinical response and side effects. ^{1,13} Treatment takes place two to three times per week until a patient is clear of symptoms. According to a separate guideline on children from the American Academy of Dermatology, National Psoriasis Foundation, excimer laser may be used in children with psoriasis and may be efficacious and well tolerated, but these options have limited supporting evidence. ¹⁴



The European Dermatology Forum and the British Association of Dermatologists provide guidelines for the management of vitiligo.³⁻⁴ The consensus of the European Dermatology Forum is that targeting phototherapy should be indicated for localized vitiligo and for small lesion of recent onset and childhood vitiligo.³ Notably, Alhowaish et al documented the effectiveness of excimer laser treatments in vitiligo in 23 separate articles that included case studies, randomized controlled studies, retrospective analyses, randomized blinded studies, and controlled comparative studies.⁹ Although the response time and the duration of response varied, the excimer laser therapy was generally effective across all of the studies.⁹ While several treatment options are available for vitiligo, targeted laser therapy delivers high intensity light to the desired depigmented area to avoid exposure to surrounding neighboring healthy skin.¹⁷

Atopic dermatitis (eczema) is a chronic, pruritic, inflammatory skin disease with clinical presentation of dry skin, severe pruritus and cutaneous hyperreactivity to various environmental stimuli. Skin hydration with emollients and moisturizers is a key component of first-line therapy. Other topical treatments, i.e., anti-inflammatory therapy with topical corticosteroids or calcineurin inhibitors can be effective in controlling pruritus. When topical therapy alone is not enough, narrowband ultraviolet B (NBUVB) or ultraviolet A1 (UVA1) phototherapy can be added. Patients with moderate to severe disease despite topical therapy may require systemic treatment such as dupilumab. Narrowband ultraviolet B (NBUVB) phototherapy is also an alternative. However, phototherapy is not suitable for infants and young children. Phototherapy can be administered in the office two to three times weekly.

Mycosis fungoides (MF) and Sézary syndrome (SS) are common subtypes of cutaneous T cell lymphoma (CTCL). MF is a mature T cell non-Hodgkin lymphoma that presents in the skin but has potential involvement of the lymph nodes, blood, and viscera. Skin lesions include patches or plaques, localized or widespread, along with tumors, and erythroderma. SS is an inflammatory skin disease with leukemic involvement by malignant T cells. Diagnosis of both MF and SS is made through skin biopsy, blood studies or nodal biopsy.

The TNMB systems is the standard method for staging MF and SS. The TNMB staging is based on evaluation of skin (T), lymph node (N), visceral (M), and blood (B). For MF, early stages (IA to IIA) consist of papules, patches, or plaques, with limited, if any, lymph node involvement and no visceral involvement. Skin-directed therapies can include topical corticosteroids, mechlorethamine, retinoids, imiquimod, localized radiation, or phototherapy (narrowband ultraviolet B [NBUVB] or psoralen plus ultraviolet A [PUVA]).²⁴ SS Stage IVA1 involves no significant lymph node or visceral involvement, Stage IVA2 is demonstrated by lymph node involvement, but no visceral involvement and Stage IVB includes visceral involvement, with or without nodal involvement. Although no standard initial therapy for patients with SS, systemic therapy can be given alone, with skin directed therapy, or with other systemic therapies.²⁵

The NCCN recommends skin-directed therapies as above, used alone or in combination of other skin-directed therapies, dependent upon limited/localized skin involvement or generalized skin involvement. ²²



Coding Implications

Codes referenced in this clinical policy are for informational purposes only. Inclusion or exclusion of any codes does not guarantee coverage. Providers should reference the most up-to-date sources of professional coding guidance prior to the submission of claims for reimbursement of covered services.

CPT® Codes	Description
96920	Laser treatment for inflammatory skin disease (psoriasis); total area less than 250 sq. cm
96921	Laser treatment for inflammatory skin disease (psoriasis); 250 sq. cm to 500 sq. cm
96922	Laser treatment for inflammatory skin disease (psoriasis); over 500 sq. cm

ICD-10-CM Diagnosis Codes that Support Coverage Criteria

ICD-10-CM	agnosis Codes that Support Coverage Criteria Description
Code	
L20.81	Atopic neurodermatitis
L20.82	Flexural eczema
L20.84	Intrinsic (allergic) eczema
L20.89	Other atopic dermatitis
L40.0	Psoriasis vulgaris (plaque psoriasis)
L80	Vitiligo
C84.00	Mycosis fungoides, unspecified site
C84.01	Mycosis fungoides, lymph nodes of head, face, and neck
C84.02	Mycosis fungoides, intrathoracic lymph nodes
C84.03	Mycosis fungoides, intra-abdominal lymph nodes
C84.04	Mycosis fungoides, lymph nodes of axilla and upper limb
C84.05	Mycosis fungoides, lymph nodes of inguinal region and lower limb
C84.06	Mycosis fungoides, intrapelvic lymph nodes
C84.07	Mycosis fungoides, spleen
C84.08	Mycosis fungoides, lymph nodes of multiple sites
C84.09	Mycosis fungoides, extranodal and solid organ sites
C84.10	Sezary disease, unspecified site
C84.11	Sezary disease, lymph nodes of head, face, and neck
C84.12	Sezary disease, intrathoracic lymph nodes
C84.13	Sezary disease, intra-abdominal lymph nodes
C84.14	Sezary disease, lymph nodes of axilla and upper limb
C84.15	Sezary disease, lymph nodes of inguinal region and lower limb
C84.16	Sezary disease, intrapelvic lymph nodes
C84.17	Sezary disease, spleen
C84.18	Sezary disease, lymph nodes of multiple sites
C84.19	Sezary disease, extranodal and solid organ sites

CLINICAL POLICY

TITLE: Laser Therapy for Skin Conditions



Reviews, Revisions, and Approvals		Approval
	Date	Date
Centene Policy created and approved.		08/16
Centene Policy CP.MP.123 updated with OH Addendum.		12/22
Policy moved to Ohio Specific template and Addendum language integrated	07/23	07/23
into policy template as Policy Statement and Procedure. Annual review.		
Added medically necessary indications I.C. atopic dermatitis and I.D.		
cutaneous T-cell lymphoma. Removed II.B. atopic dermatitis from		
insufficient evidence section. Added codes L20.81, L20.82, L20.89, C84.00		
through C84.09, and C84.10 through C84.19 to table of ICD-10-CM		
diagnosis codes that support coverage criteria. References reviewed and		
updated.		

References

- 1. Ohio Administrative Code 5160-1-14 EPSDT. https://codes.ohio.gov/ohio-administrative-code/rule-5160-1-14
- 2. Ohio Administrative Code 5160-26-03 Managed healthcare programs- covered services. https://codes.ohio.gov/ohio-administrative-code/rule-5160-26-03
- 3. Ohio Administrative Code 5160-26-03.1 Managed healthcare programs- primary care and utilization management. https://codes.ohio.gov/ohio-administrative-code/rule-5160-26-03.1
- 4. Ohio Department of Medicaid Fee Schedule: https://medicaid.ohio.gov/resources-for-providers/billing/fee-schedule-and-rates/fee-schedule-and-rates
- 5. Menter A, Korman NJ, Elmets CA, et al. Guidelines of care for the management of psoriasis and psoriatic arthritis: Section 5. Guidelines of care for the treatment of psoriasis with phototherapy and photochemotherapy [published correction appears in J Am Acad Dermatol. 2021 Feb;84(2):586]. *J Am Acad Dermatol*. 2010;62(1):114-135. Doi:10.1016/j.jaad.2009.08.026
- 6. Sidbury R, Davis DM, Cohen DE, et al. Guidelines of care for the management of atopic dermatitis: section 3. Management and treatment with phototherapy and systemic agents. *J Am Acad Dermatol*. 2014;71(2):327-349. Doi:10.1016/j.jaad.2014.03.030
- 7. Gawkrodger DJ, Ormerod AD, Shaw L, et al. Guideline for the diagnosis and management of vitiligo. *Br J Dermatol.* 2008;159(5):1051-1076. Doi:10.1111/j.1365-2133.2008.08881.x.
- 8. Taieb A, Alomar A, Böhm M, et al. Guidelines for the management of vitiligo: the European Dermatology Forum consensus. *Br J Dermatol*. 2013;168(1):5-19. Doi:10.1111/j.1365-2133.2012.11197.x.
- 9. Feldman, SR. Targeted phototherapy. UpToDate. www.uptodate.com. Updated November 16, 2022. Accessed February 16, 2023.
- 10. Specchio F, Carboni I, Carnnarozzo G, Tamburi F, Dattola E, Nistico S. Excimer UV radiation in dermatology. *Int J Immunopathol Pharmacol*. 2014;27(2):287-289. Doi: 10.1177/039463201402700217.
- 11. Feldman, SR, Mellen BG, Housman TS, et al. Efficacy of the 308-nm excimer laser for treatment of psoriasis: results of a multicenter study. *J the Am Acad of Dermatol*. 2002; 46(6):900-906. Doi:10.1067/mjd.2002.120454.



- 12. Rodewald EJ, Housman TS, Mellen BG, Feldman SR. The efficacy of 308nm laser treatment of psoriasis compared to historical controls. *Dermatol Online J.* (2001);7(2):4.
- 13. Alhowaish, AK, Dietrich N, Onder M, Fitz K. Effectiveness of a 308-nm excimer laser in treatment of vitiligo: a review. *Lasers Med Sci.* 2013;28(3):1035-1041. Doi: 10.1007/s10103-012-1185-1.
- 14. Grimes PE. Vitiligo: Management and prognosis. UpToDate. <u>www.uptodate.com</u>. Updated November 29, 2022. Accessed February 16, 2023.
- 15. Salah Eldin MM, Sami NA, Aly DG, Hanafy NS. Comparison between (311-312 nm) Narrow Band Ultraviolet-B Phototherapy and (308 nm) Monochromatic Excimer Light Phototherapy in Treatment of Vitiligo: A Histopathological Study. *J Lasers Med Sci*. 2017;8(3):123-127. Doi:10.15171/jlms.2017.22.
- 16. Comparative effectiveness review of laser therapy for psoriasis. Hayes. www.hayesinc.com. Published April 25, 2019 (annual review April 7, 2022). Accessed February 16, 2023.
- 17. Elmets CA, Lim HW, Stoff B, et al. Joint American Academy of Dermatology-National Psoriasis Foundation guidelines of care for the management and treatment of psoriasis with phototherapy [published correction appears in J Am Acad Dermatol. 2020 Mar;82(3):780]. *J Am Acad Dermatol.* 2019;81(3):775-804. Doi:10.1016/j.jaad.2019.04.042
- 18. Menter A, Cordoro KM, Davis DMR, et al. Joint American Academy of Dermatology, National Psoriasis Foundation guidelines of care for the management and treatment of psoriasis in pediatric patients [published correction appears in J Am Acad Dermatol. 2020 Mar;82(3):574]. *J Am Acad Dermatol*. 2020;82(1):161-201. Doi:10.1016/j.jaad.2019.08.049
- 19. Paller AS, Lund EB. Psoriasis in children: Management of chronic plaque psoriasis. UpToDate. www.uptodate.com. Updated August 31, 2022. Accessed February 16, 2023.
- 20. Feldman SR. Treatment of Psoriasis in Adults. UpToDate. www.uptodate.com. Updated October 12, 2022. Accessed February 16, 2023.
- 21. Kuroda Y, Yang L, Lai S, et al. A Lower Irradiation Dose of 308 nm Monochromatic Excimer Light Might Be Sufficient for Vitiligo Treatment: A Novel Insight Gained from In Vitro and In Vivo Analyses. *International Journal of Molecular Sciences*. 2021;22(19):10409. https://doi.org/10.3390/ijms221910409
- 22. Nicolaidou E, Antoniou C, Stratigos A, Katsambas AD. Narrowband ultraviolet B phototherapy and 308-nm excimer laser in the treatment of vitiligo: a review. *J Am Acad Dermatol*. 2009;60(3):470-477. doi:10.1016/j.jaad.2008.07.053
- 23. Sung JM, Bae JM, Kang HY. Comparison of cyclic and continuous 308-nm excimer laser treatments for vitiligo: A randomized controlled noninferiority trial. *J Am Acad Dermatol*. 2018;78(3):605-607.e1. doi:10.1016/j.jaad.2017.09.048
- 24. Elsaadany AE, El-Khalawany M, Elshahid AR, Seddeik Abdel-Hameed AK. Comparison between 308-nm excimer light alone versus 308-nm excimer light and platelet-rich plasma in the treatment for localized vitiligo. *J Cosmet Dermatol*. 2022;21(7):2826-2831. doi:10.1111/jocd.14582
- 25. National coverage determination: treatment of psoriasis (250.1). Centers for Medicare and Medicaid Services Web site. https://www.cms.gov/medicare-coverage-database/view/ncd.aspx?NCDId=88&ncdver=1&. Accessed February 16, 2023.
- 26. National Comprehensive Cancer Network. NCCN Clinical Practice Guidelines on Oncology: Primary Cutaneous Lymphomas. Version 1.2023. https://www.nccn.org/home.Published_ January 5, 2023. Accessed February 21, 2023.



- 27. Howe M. Treatment of atopic dermatitis (eczema). UpToDate. www.uptodate.com. Updated February 7, 2023. Accessed February 22, 2023.
- 28. Hoppe RT, Kim TH, Horwitz S. Treatment of early stage (IA to IIA) mycosis fungoides. UpToDate. www.uptodate.com. Updated January 9, 2023. Accessed February 22, 2023.
- 29. Kim EJ, Rook AH. Treatment of Sézary syndrome. UpToDate. <u>www.uptodate.com</u>. Updated January 20, 2022. Accessed February 22, 2023.

Important Reminder

This clinical policy has been developed by appropriately experienced and licensed health care professionals based on a review and consideration of currently available generally accepted standards of medical practice; peer-reviewed medical literature; government agency/program approval status; evidence-based guidelines and positions of leading national health professional organizations; views of physicians practicing in relevant clinical areas affected by this clinical policy; and other available clinical information. Buckeye Health Plan makes no representations and accepts no liability with respect to the content of any external information used or relied upon in developing this clinical policy. This clinical policy is consistent with standards of medical practice current at the time that this clinical policy was approved. "Health Plan" means a health plan that has adopted this clinical policy and that is operated or administered, in whole or in part, by Centene Management Company, LLC, or any of such health plan's affiliates, as applicable.

The purpose of this clinical policy is to provide a guide to medical necessity, which is a component of the guidelines used to assist in making coverage decisions and administering benefits. It does not constitute a contract or guarantee regarding payment or results. Coverage decisions and the administration of benefits are subject to all terms, conditions, exclusions and limitations of the coverage documents (e.g., evidence of coverage, certificate of coverage, policy, contract of insurance, etc.), as well as to state and federal requirements and applicable Buckeye Health Plan-level administrative policies and procedures.

This clinical policy is effective as of the date determined by Buckeye Health Plan. The date of posting may not be the effective date of this clinical policy. This clinical policy may be subject to applicable legal and regulatory requirements relating to provider notification. If there is a discrepancy between the effective date of this clinical policy and any applicable legal or regulatory requirement, the requirements of law and regulation shall govern. The Health Plan retains the right to change, amend or withdraw this clinical policy, and additional clinical policies may be developed and adopted as needed, at any time.

This clinical policy does not constitute medical advice, medical treatment or medical care. It is not intended to dictate to providers how to practice medicine. Providers are expected to exercise professional medical judgment in providing the most appropriate care, and are solely responsible for the medical advice and treatment of members/enrollees. This clinical policy is not intended to recommend treatment for members/enrollees. Members/enrollees should consult with their treating physician in connection with diagnosis and treatment decisions.



Providers referred to in this clinical policy are independent contractors who exercise independent judgment and over whom Buckeye Health Plan has no control or right of control. Providers are not agents or employees of Buckeye Health Plan.

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Note: For Medicaid members/enrollees, when state Medicaid coverage provisions conflict with the coverage provisions in this clinical policy, state Medicaid coverage provisions take precedence. Please refer to the state Medicaid manual for any coverage provisions pertaining to this clinical policy.

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