Capital

MEDICAL POLICY

POLICY TITLE	ROSACEA
POLICY NUMBER	MP 2.071

Effective Date:	5/1/2023

POLICY
PRODUCT VARIATIONS
DESCRIPTION/BACKGROUND
RATIONALE
DEFINITIONS
BENEFIT VARIATIONS
DISCLAIMER
CODING INFORMATION
REFERENCES
POLICY HISTORY

I. POLICY

Pharmacologic treatment (e.g., topical and oral medication) may be considered **medically necessary** to control the symptoms and signs of rosacea.

Surgical treatment of severe disfigurement associated with rhinophyma including lasers, dermabrasion, or electrosurgery may be considered **medically necessary** to sculpt the nose to a normal shape and appearance.

Nonpharmacologic treatment of rosacea, including but not limited to, laser and light therapy, dermabrasion, chemical peels, surgical debulking, and electrosurgery is considered **investigational**. There is insufficient evidence to support a general conclusion concerning the health outcomes or benefits associated with this procedure.

Cross-reference:
MP 1.004 Cosmetic and Reconstructive Surgery
MP 2.046 Light Therapy
MP 4.033 Diagnosis and Treatment of Dry Eye Syndrome

II. PRODUCT VARIATIONS

TOP

This policy is only applicable to certain programs and products administered by Capital Blue Cross and subject to benefit variations as discussed in Section VI. Please see additional information below.

FEP PPO - Refer to FEP Medical Policy Manual. The FEP Medical Policy manual can be found at:
https://www.fepblue.org/benefit-plans/medical-policies-and-utilization-management-guidelines/medical-policies

III. DESCRIPTION/BACKGROUND

TOP

Rosacea is characterized by episodic erythema, edema, papules, and pustules that occur primarily on the face but may also be present on the scalp, ears, neck, chest, and back. On occasion, rosacea may affect the eyes. Patients with rosacea have a tendency to flush or blush easily. Since rosacea causes facial swelling and redness, it is easily confused with other skin conditions, such as acne, skin allergy, and sunburn.

Rosacea affects mostly adults with fair skin between the ages of 20 and 60 and is more common in women, but often most severe in men. Rosacea is not life-threatening, but if not treated, may

lead to persistent erythema, telangiectasias, and rhinophyma (hyperplasia and nodular swelling and congestion of the skin of the nose). The etiology and pathogenesis of rosacea is unknown but may be a result of both genetic and environmental factors. Some of the theories as to the causes of rosacea include blood vessel disorders, chronic *Helicobacter pylori* infection, demodex folliculorum (mites), and immune system disorders.

While the clinical manifestations of rosacea do not usually impact the physical health status of the patient, there may be psychological consequences from the most visually apparent symptoms (i.e., erythema, papules, pustules, telangiectasias) that can impact quality of life. Rhinophyma, an end-stage of chronic acne, has been associated with obstruction of nasal passages and basal cell carcinoma in rare, severe cases. The probability of developing nasal obstruction, or basal or squamous cell carcinoma with rosacea is not sufficiently great to warrant preventive removal of rhinophymatous tissue.

Treatment

Rosacea treatment can be effective to relieve its signs and symptoms. Treatment may include oral and topical antibiotics, isotretinoin, beta-blockers, clonidine, and anti-inflammatories. Patients are also instructed on various self-care measures such as avoiding skin irritants and dietary items thought to exacerbate acute flare-ups.

Nonpharmacologic therapy has also been tried in patients who cannot tolerate or do not want to use pharmacologic treatments. To reduce visible blood vessels, treat rhinophyma, reduce redness, and improve appearance, various techniques have been used such as laser and light therapy, dermabrasion, chemical peels, surgical debulking, and electrosurgery. Various lasers used include low-powered electrical devices and vascular light lasers to remove telangiectasias, CO2 lasers to remove unwanted tissue from rhinophyma and reshape the nose, and intense pulsed lights that generate multiple wavelengths to treat a broader spectrum of tissue.

Ocular rosacea can sometimes lead to dry eye syndrome. For discussion and management of dry eye syndrome, see MP 4.033.

Regulatory Status

Several laser and light therapy systems have been cleared for marketing by the U.S. Food and Drug Administration (FDA) through the 510(k) process for various dermatologic indications, including rosacea. For example, rosacea is among the indications for:

- Vbeam laser system (Candela®)
- Stellar M22™ laser system (Lumenis)
- Excel VT®, excel V®, and exo® laser systems (Cutera)
- Harmony® XL multi-application platform laser device (Alma Lasers, Israel)
- UV-300 Pulsed Light Therapy System (New Star Lasers)
- CoolTouch® PRIMA Pulsed Light Therapy System (New Star Lasers,).
  FDA product code: GEX.

IV. RATIONALE

TOP

SUMMARY OF EVIDENCE

For individuals who have rosacea who receive nonpharmacologic treatment (eg, laser therapy, light therapy, dermabrasion), the evidence includes several small randomized, split-face design trials. The relevant outcomes are symptoms, change in disease status, and treatment-related morbidity. The randomized controlled trials evaluated laser and light therapy. No trials assessing other nonpharmacologic treatments were identified. None of the randomized controlled trials included a comparison group of patients receiving a placebo or pharmacologic treatment; therefore, these trials do not offer evidence on the efficacy of laser or light treatment compared with alternative treatments. There is a need for randomized controlled trials that compare nonpharmacologic treatments with placebo controls and with pharmacologic treatments. The evidence is insufficient to determine the effects of the technology on health outcomes.

V. DEFINITIONS

TOP

CONJUNCTIVITIS refers to inflammation of the mucous membrane that lines the eyelids.

COSMETIC SURGERY refers to an elective procedure performed primarily to restore a person's appearance by surgically altering a physical characteristic that does not prohibit normal function, but is considered unpleasant or unsightly.

FUNCTIONAL IMPAIRMENT refers to a condition that describes a state where an individual is physically limited to perform basic daily activities.

HYPERPLASIA refers to excessive proliferation of normal cells in the normal tissue arrangement of an organ.

TELANGIECTASIA refers to a vascular lesion formed by dilation of a group of small blood vessels.

VI. BENEFIT VARIATIONS

TOP

The existence of this medical policy does not mean that this service is a covered benefit under the member's health benefit plan. Benefit determinations should be based in all cases on the applicable health benefit plan language. Medical policies do not constitute a description of benefits. A member's health benefit plan governs which services are covered, which are excluded, which are subject to benefit limits and which require preauthorization. There are different benefit plan designs in each product administered by Capital Blue Cross. Members and providers should consult the member's health benefit plan for information or contact Capital Blue Cross for benefit information.

VII. DISCLAIMER

TOP

Capital Blue Cross's medical policies are developed to assist in administering a member's benefits, do not constitute medical advice, and are subject to change. Treating providers are solely responsible for medical advice and treatment of members. Members should discuss any medical policy related to their coverage or condition with their provider and consult their benefit information to determine if the service is covered. If there is a discrepancy between this medical policy and a member's benefit information, the benefit information will govern. If a provider or a member has a question concerning the application of this medical policy to a specific member's plan of benefits, please contact Capital Blue Cross' Provider Services or Member Services. Capital Blue Cross considers the information contained in this medical policy to be proprietary and it may only be disseminated as permitted by law.

VIII. CODING INFORMATION

TOP

Note: This list of codes may not be all-inclusive, and codes are subject to change at any time. The identification of a code in this section does not denote coverage as coverage is determined by the terms of member benefit information. In addition, not all covered services are eligible for separate reimbursement.

Non-Covered Services:

Procedure Codes								
15788	15789	15792	15793					

Covered when medically necessary as outlined in the policy above:

Procedure Codes								
15780	15781	15783	17000	17003	17004	17106	17107	17108
30120								

ICD-10-CM Diagnosis Code	Description
L71.0	Perioral dermatitis
L71.1	Rhinophyma
L71.8	Other rosacea
L71.9	Rosacea, unspecified

IX. REFERENCES

TOP

1. *Chang HC, Chang YS. Pulsed dye laser versus intense pulsed light for facial erythema of rosacea: a systematic review and meta-analysis. J Dermatolog Treat. Jun 2022; 33(4): 2394-2396. PMID 34291712*
2. *Husein-ElAhmed H, Steinhoff M. Light-based therapies in the management of rosacea: a systematic review with meta-analysis. Int J Dermatol. Feb 2022; 61(2): 216-225. PMID 34089264*
3. *van Zuuren EJ, Fedorowicz Z, Carter B, et al. Interventions for rosacea. Cochrane Database Syst Rev. Apr 28 2015; (4): CD003262. PMID 25919144*
4. *van Zuuren EJ, Fedorowicz Z, Tan J, et al. Interventions for rosacea based on the phenotype approach: an updated systematic review including GRADE assessments. Br J Dermatol. Jul 2019; 181(1): 65-79. PMID 30585305*
5. *Wat H, Wu DC, Rao J, et al. Application of intense pulsed light in the treatment of dermatologic disease: a systematic review. Dermatol Surg. Apr 2014; 40(4): 359-77. PMID 24495252*
6. *West TB, Alster TS. Comparison of the long-pulse dye (590-595 nm) and KTP (532 nm) lasers in the treatment of facial and leg telangiectasias. Dermatol Surg. Feb 1998; 24(2): 221-6. PMID 9491116*

7. *Mark KA, Sparacio RM, Voigt A, et al. Objective and quantitative improvement of rosacea-associated erythema after intense pulsed light treatment. Dermatol Surg. Jun 2003; 29(6): 600-4. PMID 12786702*
8. *Taub AF. Treatment of rosacea with intense pulsed light. J Drugs Dermatol. Jun 2003; 2(3): 254-9. PMID 12848109*
9. *Schroeter CA, Haaf-von Below S, Neumann HA. Effective treatment of rosacea using intense pulsed light systems. Dermatol Surg. Oct 2005; 31(10): 1285-9. PMID 16188180*
10. *Karsai S, Roos S, Raulin C. Treatment of facial telangiectasia using a dual-wavelength laser system (595 and 1,064 nm): a randomized controlled trial with blinded response evaluation. Dermatol Surg. May 2008; 34(5): 702-8. PMID 18318728*
11. *Papageorgiou P, Clayton W, Norwood S, et al. Treatment of rosacea with intense pulsed light: significant improvement and long-lasting results. Br J Dermatol. Sep 2008; 159(3): 628-32. PMID 18565174*
12. *Neuhaus IM, Zane LT, Tope WD. Comparative efficacy of nonpurpuragenic pulsed dye laser and intense pulsed light for erythematotelangiectatic rosacea. Dermatol Surg. Jun 2009; 35(6): 920-8. PMID 19397667*
13. *Lane JE, Khachemoune A. Use of intense pulsed light to treat refractory granulomatous rosacea. Dermatol Surg. Apr 2010; 36(4): 571-3. PMID 20402938*
14. *Nymann P, Hedelund L, Haedersdal M. Long-pulsed dye laser vs. intense pulsed light for the treatment of facial telangiectasias: a randomized controlled trial. J Eur Acad Dermatol Venereol. Feb 2010; 24(2): 143-6. PMID 20205349*
15. *Fabi S, Peterson J, Goldman M. Combination 15% azelaic acid gel and intense pulse light therapy for mild to moderate rosacea. Lasers Surg Med 2011;43:9689.*
16. *Kassir R, Kolluru A, Kassir M. Intense pulsed light for the treatment of rosacea and telangiectasias. J Cosmet Laser Ther. Oct 2011; 13(5): 216-22. PMID 21848421*
17. *Kim TG, Roh HJ, Cho SB, et al. Enhancing effect of pretreatment with topical niacin in the treatment of rosacea-associated erythema by 585-nm pulsed dye laser in Koreans: a randomized, prospective, split-face trial. Br J Dermatol. Mar 2011; 164(3): 573-9. PMID 21143465*
18. *Huang YE, Li XL, Li TJ. [Clinical research of topical tacrolimus ointment combined with 585 nm pulsed dye laser in the treatment of rosacea]. J Clinical Dermatol 2012; 41:3089.*
19. *Tanghetti EA. Split-face randomized treatment of facial telangiectasia comparing pulsed dye laser and an intense pulsed light handpiece. Lasers Surg Med. Feb 2012; 44(2): 97-102. PMID 22180317*
20. *Alam M, Voravutinon N, Warycha M, et al. Comparative effectiveness of nonpurpuragenic 595-nm pulsed dye laser and microsecond 1064-nm neodymium:yttrium-aluminum-garnet laser for treatment of diffuse facial erythema: A double-blind randomized controlled trial. J Am Acad Dermatol. Sep 2013; 69(3): 438-43. PMID 23688651*
21. *Salem SA, Abdel Fattah NS, Tantawy SM, et al. Neodymium-yttrium aluminum garnet laser versus pulsed dye laser in erythemato-telangiectatic rosacea: comparison of clinical efficacy and effect on cutaneous substance (P) expression. J Cosmet Dermatol. Sep 2013; 12(3): 187-94. PMID 23992160*
22. *Friedmann DP, Goldman MP, Fabi SG, et al. The effect of multiple sequential light sources to activate aminolevulinic Acid in the treatment of actinic keratoses: a retrospective study. J Clin Aesthet Dermatol. Sep 2014; 7(9): 20-5. PMID 25276272*

23. *Seo HM, Kim JI, Kim HS, et al. Prospective Comparison of Dual Wavelength Long-Pulsed 755-nm Alexandrite/1,064-nm Neodymium:Yttrium-Aluminum-Garnet Laser versus 585-nm Pulsed Dye Laser Treatment for Rosacea. Ann Dermatol. Oct 2016; 28(5): 607-614. PMID 27746641*
24. *Handler MZ, Bloom BS, Goldberg DJ. IPL vs PDL in treatment of facial erythema: A split-face study. J Cosmet Dermatol. Dec 2017; 16(4): 450-453. PMID 28752575*
25. *Kim SJ, Lee Y, Seo YJ, et al. Comparative Efficacy of Radiofrequency and Pulsed Dye Laser in the Treatment of Rosacea. Dermatol Surg. Feb 2017; 43(2): 204-209. PMID 27893539*
26. *Kwon WJ, Park BW, Cho EB, et al. Comparison of efficacy between long-pulsed Nd:YAG laser and pulsed dye laser to treat rosacea-associated nasal telangiectasia. J Cosmet Laser Ther. Oct 2018; 20(5): 260-264. PMID 29388843*
27. *Campos MA, Sousa AC, Varela P, et al. Comparative effectiveness of purpuragenic 595 nm pulsed dye laser versus sequential emission of 595 nm pulsed dye laser and 1,064 nm Nd:YAG laser: a double-blind randomized controlled study. Acta Dermatovenerol Alp Pannonica Adriat. Mar 2019; 28(1): 1-5. PMID 30901061*
28. *Kim BY, Moon HR, Ryu HJ. Comparative efficacy of short-pulsed intense pulsed light and pulsed dye laser to treat rosacea. J Cosmet Laser Ther. Aug 2019; 21(5): 291-296. PMID 30285506*
29. *Tirico MCCP, Jensen D, Green C, et al. Short pulse intense pulsed light versus pulsed dye laser for the treatment of facial redness. J Cosmet Laser Ther. Feb 17 2020; 22(2): 60-64. PMID 32041440*
30. *Maxwell EL, Ellis DA, Manis H. Acne rosacea: effectiveness of 532 nm laser on the cosmetic appearance of the skin. J Otolaryngol Head Neck Surg. Jun 2010; 39(3): 292-6. PMID 20470675*
31. *Wang H, An X, Wang Z. Effect and Safety of ALA-PDT Combined with 1550 nm Fractional Therapy Laser in Treating Rosacea. Evid Based Complement Alternat Med. 2022; 2022: 3335074. PMID 35865346*
32. *Park S, Lee JH, Kang E, et al. A randomized split-face comparative study of long-pulsed alexandrite plus low-fluence Nd:YAG laser versus pulsed-dye laser in the treatment of rosacea. Lasers Surg Med. Nov 2022; 54(9): 1217-1225. PMID 36183378*
33. *Sodha P, Suggs A, Munavalli GS, et al. A Randomized Controlled Pilot Study: Combined 595-nm Pulsed Dye Laser Treatment and Oxymetazoline Hydrochloride Topical Cream Superior to Oxymetazoline Hydrochloride Cream for Erythematotelangiectatic Rosacea. Lasers Surg Med. Dec 2021; 53(10): 1307-1315. PMID 34233378*
34. *Osman M, Shokeir HA, Hassan AM, et al. Pulsed dye laser alone versus its combination with topical ivermectin 1% in treatment of Rosacea: a randomized comparative study. J Dermatolog Treat. Feb 2022; 33(1): 184-190. PMID 32141785*
35. *Tong Y, Luo W, Gao Y, et al. A randomized, controlled, split-face study of botulinum toxin and broadband light for the treatment of erythematotelangiectatic rosacea. Dermatol Ther. May 2022; 35(5): e15395. PMID 35187781*
36. *Barbarino SC, Bucay VW, Cohen JL, et al. Integrative skincare trial of intense pulsed light followed by the phyto-corrective mask, phyto-corrective gel, and resveratrol BE for decreasing post-procedure downtime and improving procedure outcomes in patients with rosacea. J Cosmet Dermatol. Sep 2022; 21(9): 3759-3767. PMID 35765796*

37. *Tanghetti E, Del Rosso JQ, Thiboutot D, et al. Consensus recommendations from the American acne rosacea society on the management of rosacea, part 4: a status report on physical modalities and devices. Cutis. Feb 2014; 93(2): 71-6. PMID 24605343*
38. *Del Rosso JQ, Tanghetti E, Webster G, et al. Update on the Management of Rosacea from the American Acne Rosacea Society (AARS). J Clin Aesthet Dermatol. Jun 2019; 12(6): 17-24. PMID 31360284*
39. *Schaller M, Almeida LM, Bewley A, et al. Rosacea treatment update: recommendations from the global ROSacea COnsensus (ROSCO) panel. Br J Dermatol. Feb 2017; 176(2): 465-471. PMID 27861741*
40. *Schaller M, Almeida LMC, Bewley A, et al. Recommendations for rosacea diagnosis, classification and management: update from the global Rosacea Consensus 2019 panel. Br J Dermatol. May 2020; 182(5): 1269-1276. PMID 31392722*
41. *Thiboutot D, Anderson R, Cook-Bolden F, et al. Standard management options for rosacea: The 2019 update by the National Rosacea Society Expert Committee. J Am Acad Dermatol. Jun 2020; 82(6): 1501-1510. PMID 32035944*
42. *Erceg A, de Jong EM, van de Kerkhof PC, et al. The efficacy of pulsed dye laser treatment for inflammatory skin diseases: A systematic review. J Am Acad Dermatol. Oct 2013; 69(4):609-615 e608. PMID 23711766*
43. *Maier, L. E. (December 2022). Management of Rosacea. UpToDate.*
44. *Blue Cross Blue Shield Association Medical Policy Reference Manual. 2.01.71, Nonpharmacologic Treatment of Rosacea. January 2023*

Other Sources:

Taber's Cyclopedic Medical Dictionary, 21st edition.

X. POLICY HISTORY

TOP

MP 2.071	
	2/27/20 Consensus review. Policy statement unchanged. References and Background updated. Coding reviewed.
	11/20/20 Consensus review. Policy statement unchanged. References updated. Removed procedure code 17104 (deleted code) added 17004.
	8/17/2021 Consensus review. No change to policy statement. References reviewed and updated.
	3/22/2022 Consensus review. No change to policy statement. References reviewed. Added INV codes 15788, 15789, 15792 and 15793.
	1/30/2023 Consensus review. No change to policy statement. Background/regulatory status updated. References reviewed and updated.

Top

Health care benefit programs issued or administered by Capital Blue Cross and/or its subsidiaries, Capital Advantage Insurance Company®, Capital Advantage Assurance Company®, and Keystone Health Plan® Central. Independent licensees of the Blue Cross BlueShield Association. Communications issued by Capital Blue Cross in its capacity as administrator of programs and provider relations for all companies.