Section A-Research paper
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Management of Nasal BASAL CELL CARCINOMA IN rural COUNTRY – A CASE REPORT

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ABSTRACT
Basal Cell Carcinoma is the most frequent skin cancers that result of a complex interaction between environmental, phenotypic and genetic factors. Ultraviolet (UV) exposure is the major carcinogenic factor so the predilection area of BCC is skin that is exposed to UV rays frequently. BCCs rarely metastasize but will be cosmetically problematic when it appears on the face and exposed areas. Case is reported in an adult female in a rural setup who came for cosmetic purpose. Who was treated with best modality available in setup, wide local excision with local nasolabial flap reconstruction.
Keywords: Skin cancer, Basal cell carcinoma, Wide local excision, Flap reconstruction.

INTRODUCTION

Basal cell carcinoma is a skin cancer, most frequent skin cancer in adult patients, rarely metastasize, but frequently multiple and recurrent on sun-exposed skin.[1] Clinically, BCCs appear on sun-exposed skin, especially on the face and neck. Most common sites for BCC are face, head mainly scalp, neck and hand. Most BCCs are slow growing and have a low metastatic potential. However, they are locally invasive and can be destructive to surrounding tissues.[2,3] Incidents of BCC rises significantly after the age of 40 years, but recently an increased incidence has been registered among the younger population, especially women, as a result of a greater UV exposure to the sun or artificial sources.[4] Significant exposures should be major part for assessing an individual's risk include higher number of severe or blistering sunburns. Furthermore higher levels of cumulative UV Radiation must also be assessed.[5] Although there are several treatment for basal cell carcinoma, surgery is the standard treatment for most basal cell carcinoma.[1]

CASE REPORT

72-year-old woman, a farmer from Bojonegoro, Indonesia, with complaints of loose nodular growth over the right lateral of ala nasi of right nostril since 1 year, growth progressively to current size, associated with itching and bleeding when scratched. From local examination (Figure 1), a 3x2 cm nodular was found on the lateral edge of the right ala nasi which was a rough black-brown lesion, slightly tender and itching, no edema, with minimal induration. No palpable lymph nodes and no similar lesion in other parts of body.

Figure 1. Local Examination of BCC on right ala nasi

There are no other complaints such as epistaxis, no difficulty breathing, no vision abnormalities, no difficulty swallowing and no discharge from lesion. There was no history of similar lesion, no past surgical history, and no history of similar lesion in her family. No history of trauma in nose. No history loss of appetite and weight. No history of hypertension and diabetes. No history of backache, cough, fever, headache, breathless. No history of treatment taken for same. On general examination patient was averagely built with stable vitals.

Patient and relatives are given explanation and information related to the disease, and offered for therapy. After written and verbal informed consent, patient underwent wide local excision (Figure 2) with Naso-Labial flap cover over the area (Figure 3).

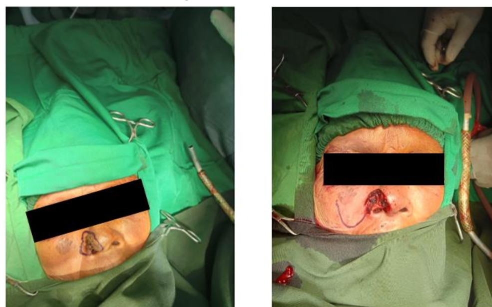

Figure 2. Intraoperative photo, design preoperative and post wide local excision of BCC

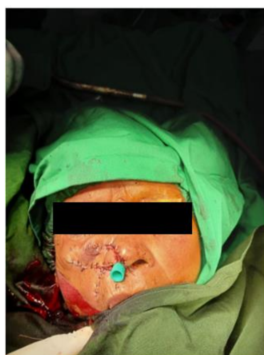

Figure 3. Nasolabial flap cover over the area

The part of lesion was sent to the relevant department for histopathological examination.

Postoperative period was uneventful successful acceptance of nasolabial flap. After 3 months post operative patient must be controlled and re-evaluated her surgical wound (Figure 4). Postoperative wound on nose looks good and better. Wound care must be done properly and cleanly to maintain the healing process.

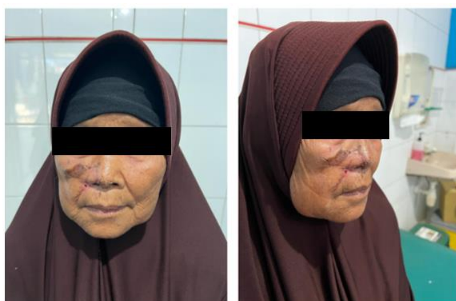

Figure 4. After 3 months postoperative

While waiting, if histopathology examination has been done and reports suggestive of basal cell carcinoma, patient is offered and directed for further oncological adjuvant therapy.

DISCUSSION

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Basal cell carcinoma can divided into some clinical subtypes, nodular, superficial, and morpheaform. Combinations from another types with nodular type may occur. Occasionally, pigmented BCC can appears. Called pigmented because variable amounts of melanin may be present within these tumors.[6]
Approximately, 85% of all BCCs appear on the head and neck region. Nodular BCC has variable appearance, shiny, pearly papule or nodule with a smooth surface, rolled borders, and arborizing telangiectatic surface vessels. Pigmented BCC usually may appear blue, brown, or black in the lesion because it has a nodular histological pattern and contains melanin. Pigmented BCC may be mistaken with melanoma.[7]
The second most common clinical subtype is superficial BCC, up to 15% of cases. A lesion can appears as a well-circumscribed, patch, thin papule, thin plaque, or scaly, and pink-to-red macule.[6]
Superficial BCC is the least invasive of the subtypes. Superficial BCC most commonly occur on the trunk and extremities.[7]
Morpheaform BCC called morpheaform or sclerosing due its clinical resemblance to an indurated plaque of morphea, or localized scleroderma. This subtypes accounts for a low proportion of cases, estimated at 5-10%. It has clinical appearance as pink-to-ivory-white, smooth, shiny, scarlike, indurated plaques or depressions with ill-defined borders. Frequently, there is associated atrophy, telangiectasias, erosions, or small crusts. Lesions are notorious for their subtlety. Also known as infiltrating BCC because more aggressive than nodular and superficial BCC. Morpeafrom BCC tends to exhibit subclinical spread with the potential for extensive local destruction.[6]
Treatment for BCC requires a multi-disciplinary approach where different treatment modalities like surgery, include electro desiccation and curettage, excisional surgery, cryosurgery, mohs micrographically controlled surgery.[3] Radiation therapy, Hedgehog Pathway Inhibitors (HPI), and topical farmacologic therapy, also can be considered.[8]
The first choice of therapy due of its high efficacy is surgical excision. Surgical excision is the standard therapy for BCC. Studies of the surgical margins likely to achieve the complete removal of lession at various anatomical locations with 4- to 5-mm surgical margins have reported 95% 5-year cure rates.[2]
Mohs micrographic surgery (MMS) is a procedure with microscopically controlled, tissuesparing surgical technique. MMS allows histological evaluation of the peripheral margin in the course. The tumor is surgically removed layer by layer and each layer is examined microscopically on site. This procedure is carried out until no abnormal cells remain.[2]
BCC are inaccessible to standard treatments in some rare case. In these rare cases, radiotherapy (RT) may be considered. Patients unwilling to undergo surgery or with significant comorbidities can consider for this treatment option. There are 3 different radiation modalities: low-energy X-rays, high-energy RT, brachytherapy. Treatment success has probability until 90%, which is combination with surgical treatment.[9]
Hedgehog pathway inhibitors (HPI) is an treatment option for locally advanced BCC or in the rare case of metastatic BCC. There are 2 commercially available HPI: vismodegib and sonidegib. However, many patients decide to discontinued the treatment because of side effects like muscle spasms, dysgeusia, fatigue, weight loss, and alopecia are common. Furthermore, treatment with HPI is associated with high costs.[9]
Topical treatment like 5-Fluorouracil 5%, Imiquimod can be considered. The pyrimidine analog fluorouracil (FU) is an antineoplastic antimetabolite that interferes with DNA synthesis by inhibiting thymidylate synthetase. Fluorouracil 5% cream or solution can topically applied for the treatment of BCC. Next is imiquimod, it can be another option. It is an immune response modifier that induces monocytes, macrophages, and dendritic cells to produce the cytokines that stimulate cellmediated

immunity. It can circumventing their anti-apoptotic mechanisms by promotes the apoptosis of tumor cells.[2]

Patients with a history of BCC should be counseled regarding the need for sun protection, sun avoidance, and tanning booth avoidance. Sunscreens is recommended in combination with other sun-protective such as umbrella to seeking shade and wearing head coverings. Broad spectrum chemical and physical sunscreens have been shown to reduce ultraviolet light exposure per unit time.[10]

CONCLUSION

One of the major problems from basal cell carcinoma is cosmetic problems. Surgical treatment like wide local excision with naso-labial flap cover can be considered as therapy which gives better cosmetic results.

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