

Non Hodgkin's Lymphoma: A Rare Tumor of Nasal Mucosa Treated with LAS-01

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Abstract

Alternative systems of medicine including Ayurveda has remedies for terminal diseases like Cancers. A herbo-mineral formulations (LAS-01) developed by Lavanya Ayurvedic was employed any case of Non Hodgkin's Lymphoma under permission of IEC of Hospital. The patient was closely monitored for day to day effects of the formulations. After Chemotherapy and Radiation with no remedial effects, the case (N.A.) was admitted for his treatment at Lavanya Ayurveda Hospital. In a short span of treatment, marked clinical and radiological effects were observed. The patient felt a for better improvement in comparison of modern treatment in healing of nasal wound and quality of life (QOL).

Keywords: Herbo-mineral formulations; LAS-01; Non Hodgkin's Lymphoma (NHL).

Introduction

WHO has recommended research in alternative system of medicine for diseases which are refractory to modern system of medicine or where there is limitation due to their serious adverse events such as in cases of cancer.[1] Hence in the present case report study, a Herbomineral preparation based on ancient ayurvedic literature Las-01 was given to a case of cancer of nasal mucosa to evaluate its efficacy and safety. Nasopharyngeal Carcinoma (NPC) is a specific type of cancer in the upper-throat area directly behind the nasal cavities. NPC is defined by its anatomical location in the nose and throat.[2] Anatomically, the nasopharynx is below the base of the skull and just above thin soft

palate.[3]

The mucosa of the nasal cavity consists of ciliated pseudostratified columnar epithelial like that of (respiratory mucosa). As such nasal sinuses are also lined by respiratory epithelium and melanocytes are scattered throughout the region. Maxillary sinus is the most common site but the cancers of the nasal cavity are rare[4] with which the present case (Noor Alam Aged about 21 years) was admitted at Lavanya ayurvedic and cancer research center, Lucknow.

Case report

A 21 year male young man (NA) brought by his relatives at Lavanya Cancer Hospital and research center, Lucknow on 1-11-11 with a cauliflower like mass mainly present on the left side of his nasal region but it was also involving the other side of the nose and was extending up to the region of the upper lip and left eye which was closed. The mass was infected with multiple maggots and it was foul smelling. The patient's history revealed that some 30 months ago he met with an accident and had nasal injury. Next day, he started having fever with rigor for which he sought some treatment by a general practitioner but was not much relieved rather he felt a hole in

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Figure 1**Figure 2**

his hard palate. Subsequently few days later, CT scan revealed thickened lining of maxillary, ethmoid and sphenoid sinuses along with eroded palate. Two months later, Palatal fistula was repaired on 24-2-11 but bleeding persisted. Histology of biopsied tissue revealed lymphoma with infiltration and subsequently at Cancer Research Institute, Himalayan Hospital, Dehradun he was diagnosed as a case of Non-Hodgkin's lymphoma of the nasal cavity, for which he was given chemotherapy. But his condition deteriorated with further increase in naso labial mass (Photo Fig 1) which was foul smelling and maggots were present in the mass, His treatment with Las-01 of 1 gm BD was started and within a matter of 3 days, he showed improvement in his general condition, improvement in his appetite and his swelling was decreased and there were no maggots and the oozing fungating mass dried up and reduced by 10% in the size. His CT scan revealed a naso-labial mass with pansinusitis on 12-11-11 (Photo Fig 2). Over a period of one month, he showed no increase in the size of the tumour rather it decreased significantly along with the decrease in surrounding inflammatory mass with oedema and it was without any maggots. There was a marked improvement in his general condition. After 2 months of treatment, his FNAC report (02-01-2012) showed only chronic inflammatory lesion and no neoplastic pathology was seen.

Discussion

Nasopharyngeal carcinoma (NPC) is a tumor arising from the epithelial cells that cover the surface and line the nasopharynx and NPC is the commonest epithelial cancer in adults.[5] Most patients present with stage III and IV[5] whereas most common cancer of the nasal cavity and paranasal sinuses is squamous cell carcinoma which consists of ciliated pseudostratified columnar epithelium like that of respiratory mucosa. Similarly the sinuses are also lined by respiratory epithelium and melanocytes are scattered throughout the region. Squamous cell carcinoma is most common especially of the maxillary antrum, whereas the cancers of the nasal cavity are one of the rare tumors.[4]

In the present case, traumatic injury in the nasal region caused palatal perforation also due to pre-existing painless friable cancerous mass of NHL associated with hypertrophy of the mucosal lining of maxillary, Sphenoid and ethmoid sinuses and the overgrowth with closed his left eye. This has led to formation of palatal fistula along with the mass causing bleeding from maxillary tumor due to its friability in the month of Jan 11 and subsequently it was repaired in Feb 11 however, the bleeding continued due to friability of the cancerous mass. The patient was not relieved of his signs and symptoms hence in the month of Nov 11, he was given 7 cycles of chemotherapy at Cancer Research Institute, Himalayan Hospital, Dehradun for non hodgkin's lymphoma of nasal cavity which got fungated and infected with pansinusitis. Lymphomas of the nasal cavity and paranasal sinuses are uncommon.[7] NHLs of the sinonasal tract are uncommon malignancies representing 3% to 5% of all malignancies, with NHL accounting for 60% of all lymphomas.[8] In Western populations, predominance of the histological type is unclear, where B-cell lesions more common[9] whereas in eastern population there is greater frequency of T-cell lesions.[10]

Cancers of the nasal cavity are rare[4] to which group this patient also belongs. In such

cases CT scanning delineates the extent of the cancer. This NHL case was associated with hypertrophied mucosal lining of maxillary, ethmoid, sphenoids sinuses as well as obstruction of the both ostia, which became nasolabial fungating mass along with pansinusitis after 11 months. On clinical examination the skin of the cheek, the maxillary sinuses, the floor, the orbit and the palate were involved indicating an advanced type of malignancy in this case. Such cases of nasal cavity and maxillary sinus cancer rarely metastasize to the regional lymph node[4], and as such in our case also lymph node was not palpable.

Normally such a carcinoma is extremely sensitive to radiotherapy and cytotoxic chemotherapy but in this case the chemotherapy given has failed to produce any visible clinical effect which was also confirmed by the CT scan done 11 months later. One thing is very clear that our herbomineral drug given in the beginning of Nov 2011 produced remarkable clinical improvements however radiologically the size of the tumor did not change. Such findings indicate that tumor did not progress after Las-01 treatment. It clearly indicates that the test herbomineral drug did stop the progression of the tumor but the clinical improvement reflects the carcinostatic property of the drug. We have reported an enhanced apoptotic activity and anti proliferating activity in human HELA as well as MCF 7 cell lines *in vitro* experiments (personal communication). It has been recently recognized that deregulated apoptosis constitutes a major clinical hurdle in the treatment of cancer and today the goal of therapeutic strategy is to trigger tumor selective cell death[4] which is evident from our *in vitro* experiments (personal communication).

It is concluded that this herbomineral preparation Las-01 is a carcinostatic drug which needs to be more extensively studied in different types of the malignancies, a work which is been extensively done at our center in addition to other *in vitro* studies to find out the underline mechanism of action of this drugs.

Conclusion

It is concluded from the above case study that the subject (NA) was admitted in our hospital that was refractory to the modern treatment with chemotherapy. When this case with progressive disease was treated with Las01, a novel herbomineral drug showed an excellent response both clinically as well as radiologically. Las-01 needs further evaluation in different types of cancer.

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