Long-term Survivor of Primary Anorectal Malignant Melanoma by a Multi-disciplinary Approach

Toshihiro Yamashita,1 Hidetaka Uramoto2 and Takashi Nagaie,1 1Department of Surgery, Aso Iizuka Hospital, Iizuka and 2Second Department of Surgery, University of Occupational and Environmental Health, Kitakyushu, Japan.

Anorectal malignant melanoma tends to show an aggressive biological behaviour. Therefore, the 5-year survival rate is limited. We herein present a successful case of a super-long-term survivor (20 years) who underwent multi-disciplinary treatment. The present case suggests that a multi-disciplinary approach may be beneficial for patients with thick and extensively sized lesions after radical resection for primary anorectal malignant melanoma. [Asian J Surg 2011;34(2):97–98]

Key Words: anorectal, malignant melanoma, survival

Introduction

Anorectal malignant melanoma is very rare,1 and surgery is the mainstay of treatment because there is no effective systemic therapy.2,3 Therefore, the 5-year survival rate is 10% or less even when radical surgery is performed.4 There are few reported cases of long-term survival. We herein report the successful treatment of a patient by a multi-disciplinary approach that involved surgical resection, mitomycin C, and interferon (IFN)-beta.

Case report

A 69-year-old female was admitted to our department for anal bleeding. A physical examination revealed no remarkable findings in the chest or abdomen and no lymphadenopathy in the inguinal region. There was also no pigmentation of the skin. A digital examination revealed a soft, elastic mass in the anorectal region.

Colonoscopy revealed a 5 cm × 5 cm villous, elastic, soft, mobile, intra-luminal mass in the anal canal, located 3 cm from the anal verge. Chest X-ray, abdominal ultrasonography, and computed tomography of the chest and abdomen demonstrated no distant lesions. The pathological diagnosis of the tumour was malignant melanoma. The serum carcinoembryonic antigen and α-fetoprotein levels were normal. The patient underwent a segmental resection with pelvic node dissection of the lymph nodes around the nervus obturatorius in the pelvic space; the lymphatic flow of malignant cells was taken into careful consideration. She suffered no major post-operative complications.

A histological examination revealed a blockish 50 mm × 50 mm tumour on the dental line, approximately 6 cm from the proximal margin of the resection because preoperatively, the depth of this lesion was judged to be submucosal. Microscopy revealed malignant cells with bizarre and hyper-chromatic nuclei localised within the upper dermal infiltration (Figure 1A). Immunohistochemically, most of the tumour cells were positive for HMB-45 (Figure 1B), S100, and vimentin, but negative for EMA, AE-1, AE-3, CDS6, chromogranin-A, and LCA. These findings indicated a diagnosis of primary anorectal malignant melanoma. No lymph node metastasis (n = 20) was observed. The depth of this lesion was judged to be mucosal and was diagnosed as pathological stage 0.
As adjuvant chemotherapy, the patient was given 20 mg mitomycin C (MMC) on the 1st postoperative day and 3 million units of IFN-beta for 1 month following surgery. No adverse events occurred with the exception of a transient high fever. She was discharged after an uneventful recovery on the 16th day after surgery and was scheduled for follow-up at regular intervals every 3 months for the 1st year and every 6 months after that. There has been no evidence of recurrence or metastases in the 20 years following the operation.

Discussion

Radical resection should be the first consideration in patients with localised anorectal malignant melanoma, particularly those with no evidence of nodal metastasis. However, the 5-year survival rate is limited. Few cases of long-term survival have been reported. Is additional treatment necessary for this patient? To determine the prognosis, we should consider two factors: tumour thickness and size. A thin (< 1 mm) and small (< 25 mm) malignant melanoma has a more favourable prognosis than a thicker, larger one. The thickness and size of the lesion was 2.5 and 50 mm, respectively, in this case. Therefore, we believed that a multi-modal approach would be needed to cure this disease. Successful prolongation of survival has been reported with the administration of IFN-beta and MMC. Consequently, she was treated with IFN-beta and MMC. In conclusion, a multi-disciplinary approach should be considered to cure thick and extensively sized malignant melanomas.

References