

## Comments on “Mucoepidermoid carcinoma of the bronchus: a rare early diagnosis”

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Dear Editor,

An article published in 2020 in this journal reported a rare case of a young medical student presenting with low-grade mucoepidermoid carcinoma (MEC) of the central airway. Curative sleeve resection was done, with negative margins and no evidence of lymph nodal involvement [1]. The current letter

presents a 3-year follow-up of the same individual and a short review of the evidence available for post-resection monitoring in such patients.

After the patient’s successful surgery in 2020, a close follow-up was done with annual check bronchoscopies (Figure 1). Each of these showed a healthy anastomotic site in the left main

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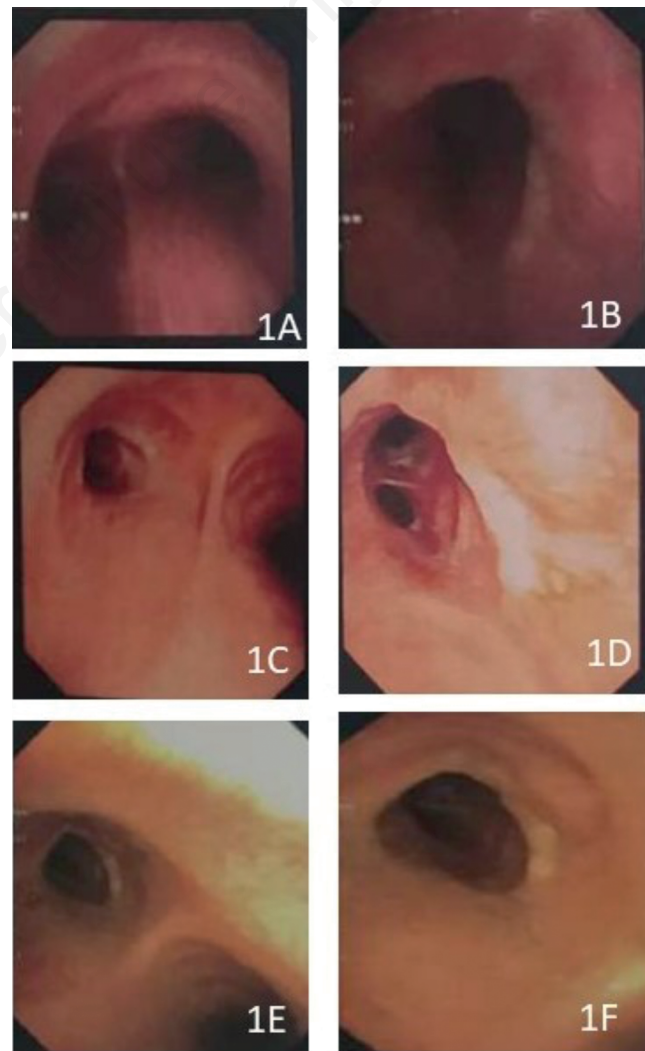
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**Figure 1.** Serial bronchoscopy done over 3 years, showing a healthy line of anastomosis in the left main bronchus. Image of the carina in 2021 (A), 2022 (C), and 2023 (E) with an image of the left main bronchus 2021 (B), 2022 (D), and 2023 (F) showing a healthy line of anastomosis in the left main bronchus.

**Table 1.** Studies showing follow-up of mucoepidermoid carcinoma of airways.

Author	Patients	Treatment	Follow-up duration	Follow-up modality
Al-Halawani <i>et al.</i> [2]	1	Open thoracotomy	2 years	Bronchoscopy
Abu Saleh <i>et al.</i> [3]	1	Open thoracotomy	6 months	Computed tomography
Kawano <i>et al.</i> [4]	1	Open thoracotomy	2 years	Clinical
Breyer <i>et al.</i> [5]	5	Bronchoplasty and lobectomy	4-15 years	Clinical and bronchoscopy
Sonobe <i>et al.</i> [6]	1	Chemotherapy in view of lung metastasis	25 months	Clinicoradiological
Kim <i>et al.</i> [7]	8	Surgery	8-103 months	Clinicoradiological
Heitmiller <i>et al.</i> [8]	18	Surgery	12 low-grade tumours had 100% survival at mean 4.7 years and all 8 high grades died in 16 months	Clinicoradiological
Chen <i>et al.</i> [9]	1	Carina resection	1 year	Clinicoradiological
Zheng <i>et al.</i> [10]	2	Argon plasma coagulation	3 months	Not mentioned
Abdennadher <i>et al.</i> [11]	22	Surgery	10 high grade tumor patients had 0% survival at 6 years	Not mentioned

bronchus with pallor and a raised healing scar. There was no endobronchial lesion or recurrence of growth. The patient was asymptomatic but apprehensive regarding recurrence. Due to the paucity of literature on follow-up in MEC, a biopsy of the original site of the lesion was planned, which revealed granulation fibrous tissue consistent with a healthy anastomotic site reaction. Thus, there was no clinical, radiological, bronchoscopic, or pathological evidence of recurrence for a follow-up of 3 years to date.

MECs of the airways are rare tumors; thus, no separate treatment or follow-up guidelines are available. A PubMed search of [mucoepidermoid carcinoma] and [{trachea or bronchus or airway}] revealed only 46 studies to date. The literature regarding the follow-up of such tumors in adult patients is limited to a few case series and reports enlisted in Table 1 [2-11].

A review of the above-listed studies makes it evident that MEC of airways is an uncommon malignancy. It is often located in the trachea or near the carina. Most patients require a surgical dissection, which could be a sleeve resection or an extensive surgery depending on the extent of the tumor. Low-grade tumors have good prognosis and survival and can be followed up clinically together with radiological investigations. There is no recommendation regarding the need for a repeat biopsy during post-resection follow-up of MEC. Most case studies followed up with only radiological surveillance. However, a high-grade tumor with lung or lymph node metastases needs to be followed up diligently because of poor overall survival.

Our three-year follow-up with annual check bronchoscopy showed that MEC did not recur post-resection. Additionally, healthy scar tissue was maintained at the anastomotic site. There were no intra-airway complications during the 3-year follow-up. The rare incidence of MEC makes it difficult to reach a consensus for or against bronchoscopy-based follow-up. Currently, it may be advisable to use bronchoscopy as a complementary modality on an individual basis to survey for recurrences of MEC.

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