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# 胸腔醫學

### Thoracic Medicine

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#### 台灣胸腔暨重症加護醫學會

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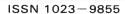
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## Cigarette Smoking Increases the Risk of Latent Tuberculosis Infection: A Cross-Sectional Study in a TB-Endemic Area

Jia-Yih Feng\*,\*\*, Sheng-Wei Pan\*,\*\*, Shiang-Fen Huang\*\*,\*\*\*, Wei-Juin Su\*,\*\*

**Introduction:** An association between smoking and latent TB infection (LTBI) using the tuberculin skin test was noted in previous reports. The impact of smoking, including intensity and duration, on LTBI deserves further investigation with a more specific diagnostic tool: the interferon-y release assay (IGRA).

**Methods:** From 2011 to 2013, individuals at high risk for LTBI and progression from LTBI to active TB were enrolled. LTBI was diagnosed by the QuantiFERON-TB Gold In-Tube test. Patients were categorized as never-smokers, ex-smokers or current smokers. The associations between smoking and LTBI were analyzed accordingly. The impact of smoke exposure on interferon-y responses was explored as well.

**Results:** During the study period, we enrolled 1,037 patients in our analysis, including 167 ex-smokers, 152 current smokers, and 718 never-smokers. The proportions of LTBI among ex-smokers, current smokers, and never-smokers were 38.9%, 37.5%, and 23.4%, respectively; ever-smokers had a significantly higher incidence of LTBI than never-smokers (P<0.001). In multivariate analysis, both current smokers (OR 1.85, 95% CI 1.19-2.86) and ex-smokers (OR 1.66, 95% CI 1.06-2.60) were significantly associated with an increased risk of LTBI. After adjusting for related clinical factors, a dose-response relationship was found between LTBI and smoking duration (P<sub>trend</sub><0.001). The relationship between LTBI and smoking intensities was less consistent. Patients in the IGRA-positive population with higher smoking intensities had stronger interferon-γ responses. In the IGRA-negative population, the interferon-γ responses were comparable among patients with various smoke exposures.

Conclusions: Smoking significantly increases the risk of LTBI in high-risk individuals, especially those with a longer duration of smoking. *(Thorac Med 2017; 32: 201-212)* 

Key words: interferon-y release assays, latent tuberculosis infection, smoking

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#### 抽菸增加潛伏結核感染風險——個結核病盛行區的 橫斷面研究

馮嘉毅 \*,\*\* 潘聖衛 \*,\*\* 黄祥芬 \*\*,\*\*\* 蘇維鈞 \*,\*\*

前言:過去使用結核菌素測驗的研究顯示抽菸會增加潛伏結核感染的風險。但是使用丙型干擾素測 驗分析抽菸與潛伏結核感染相關性的研究相對有限。

方法:自2011年至2013年收集潛伏結核感染高風險族群病人,以丙型干擾素測驗的結果診斷潛伏結 核感染,分析病人抽菸情形與合併潛伏結核感染的相關性。

結果:在 1,037 位受試者中,有過去與現今抽菸史者的病人合併潛伏結核感染的比例顯著高於無抽菸者 (38.9% vs. 37.5% vs. 23.4%, P<0.001)。過去抽菸史  $(OR\ 1.66,95\% \text{ CI } 1.06-2.60)$  與現今抽菸史  $(OR\ 1.85,95\% \text{ CI } 1.19-2.86)$  都會顯著的增加潛伏結核感染的風險,而且會隨著抽菸時間的增加而上升  $(P_{trend}<0.001)$ ,但與每日抽菸量的相關性則較低。

結論:抽菸會顯著增加潛伏結核感染的風險,而且與抽菸的時間有正向的劑量反應關係。(胸腔醫學 2017: 32: 201-212)

關鍵詞:潛伏結核感染,抽菸,丙型干擾素測驗

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#### Good's Syndrome (Thymoma and Immunodeficiency): Report of 2 Unique Cases and a Literature Review

Chun-Hsiang Hsu\*, Wen-Jen Lin\*, Ruay-Sheng Lai\*,\*\*

Good's syndrome is defined as a thymoma with T-cell and B-cell immunodeficiency. Patients with Good's syndrome are susceptible to encapsulated bacterial, viral, fungal, and other opportunistic infections, and also frequently have autoimmune manifestations, such as myasthenia gravis, pure red cell aplasia, and other hematological abnormalities. Here, we report 2 cases of Good's syndrome with unique presentations: 1 patient presented with Kaposi sarcoma, the other with myelodysplastic syndrome (MDS). Both of our patients suffered from recurrent infections in spite of thymomectomy. One patient received monthly intravenous immunoglobulin replacement therapy, which decreased the number of infections. These cases can enhance our knowledge of a rare but potentially recurrent lethal infectious disease and our understanding of the unique presentations of Good's syndrome patients. (Thorac Med 2017; 32: 213-219)

Key words: Good's syndrome, thymoma, immunodeficiency, intravenous immunoglobulin

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#### 古德氏症候群(胸腺瘤合併免疫低下)-病例報告

許淳翔\* 林文仁\* 賴瑞生\*,\*\*

古德氏症候群定義為胸腺瘤病患合併 T 細胞和 B 細胞免疫缺陷,患者易受夾膜性細菌,病毒,真菌和伺機性病原體的感染。部分患者也有自體免疫的表現,例如重症肌無力,純紅血球再生不良和其他血液學異常。我們報導二位古德氏症候群伴隨特殊表現的病患。對於胸腺瘤合併復發性感染的患者,應進行免疫學檢查,包括淋巴細胞亞群分析和定量免疫球蛋白。早期診斷及治療古德氏症候群對於預後有幫助。適合開刀的胸腺瘤患者應接受胸腺切除術,以防止局部浸潤和遠處轉移。大多數患者在胸腺切除術後,無法改善低丙種球蛋白血症。為了降低各種感染的風險,建議使用預防性靜脈內免疫球蛋白。希望藉由此病例報告能讓臨床醫師增加對此少見疾病的了解。(胸腔醫學 2017; 32: 213-219)

關鍵詞:古德氏症候群,胸腺瘤,免疫缺陷,静脈注射免疫球蛋白

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# Third-Generation Tyrosine Kinase Inhibitor Successfully Treated a T790M-Positive Lung Cancer Patient with Iris Metastasis – Case Report

Hian-Koon Chew\*, Guan-Chin Tseng\*\*\*\*\*, Chun-Ju Lin\*\*,\*\*\*\*\*, Chen-Wen Su\*\*\*\*\*, Chih-Yen Tu\*,\*\*,\*\*\*, Te-Chun Hsia\*,\*\*\*\*, Wu-Huei Hsu\*,\*\*

Lung cancer with eye metastasis is very rare, especially metastasis to the iris. Approximately 21% of metastatic uveal tract tumors originate from the lung, and less than 10% of uveal metastases involve the iris. A 48-year-old Taiwanese female with the initial diagnosis of adenocarcinoma of the lung, stage IV, had redness and an itching sensation with tearing in the right eye for 1 week. The patient underwent ocular incisional biopsy of her right iris for suspected ocular metastasis. The pathology favored metastatic adenocarcinoma, which was consistent with the previous diagnosis of lung cancer. We successfully treated the metastatic iris tumor with a 3rd-generation tyrosine kinase inhibitor. The patient was still alive as of this writing, 1 year after metastasis to the iris was found. (*Thorac Med 2017; 32: 220-225*)

Key words: lung cancer, iris, eye metastasis, T790M

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#### 第三代 TKI Osimertinib 成功治療一位 T790M 陽性之肺癌 併虹膜轉移之病人-病例報告

周賢坤\* 曾冠欽\*\*\*\*\* 林純如\*\*,\*\*\*\*\*\* 蘇振文\*\*\*\*\*\* 涂智彦\*,\*\*,\*\*\* 夏德椿\*,\*\*\*\* 徐武輝\*,\*\*

肺癌併眼部轉移非常少見,尤其是轉移到虹膜。大部分眼眶內轉移是發生在葡萄膜。有百分之二十的葡萄膜腫瘤轉移是源自於肺部,小於百分之十的葡萄膜轉移牽涉及虹膜。在此我們描述一位四十八歲女性肺腺癌病人合併肺部,縱膈腔,肋膜,右眼及腦部的轉移。病人右眼發紅伴隨會癢及流淚約一個星期。她接受右眼虹膜切開術,腫瘤免疫螢光染色後發現 CK7 與 TTF-1 呈現陽性反應,確定為肺腺癌轉移至眼部。我們成功用第三代酪氨酸激酶抑制劑 Osimertinib 治療此轉移性虹膜腫瘤,病人從診斷出有虹膜轉移開始已健在地活了一年以上至今。(胸腔醫學 2017: 32: 220-225)

關鍵詞:肺癌,虹膜,眼部轉移,T790M

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### Diffuse Large B-cell Lymphoma Presenting with Massive Pleural Effusion

Chi-Yi Lin\*,\*\*, Chun-Han Wu\*\*\*, Chun-Hsiung Huang\*\*, Tsai-Wang Huang\*

Malignant lymphoma with pleural involvement affects 16% of patients with non-Hodgkin lymphoma during disease progression. Diffuse large B-cell lymphoma is the most common subtype of non-Hodgkin lymphoma and accounts for approximately 24% of all cases. For lymphoma specified by site, primary effusion lymphoma is defined as lymphoid proliferations in the body cavities without extracavitary tumor masses, and accounts for 7% of all lymphomas. Primary effusion lymphoma is usually found in the pleural, peritoneal, and pericardial cavities, and even in the cerebrospinal fluid, and is universally associated with human herpes virus-8. We present the case of a 57-year-old man with diffuse large B-cell lymphoma with extranodal sites of involvement and pleural effusion who was negative for human immunodeficiency virus infection and not a recipient of an organ transplant. However, serology revealed he was positive for hepatitis C virus infection. The malignant pleural effusion was in complete remission after 3 cycles of R-CHOP chemotherapy. (*Thorac Med 2017; 32: 226-231*)

Key words: diffuse large B-cell lymphoma, non-Hodgkin lymphoma, primary effusion lymphoma

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#### 瀰漫性大型 B 細胞淋巴癌合併大量胸水病例報告

林祈邑\*,\*\* 吴俊漢\*\*\* 黄俊雄\*\* 黄才旺\*

惡性淋巴癌病肋膜侵犯約占非何杰金氏淋巴癌病患的百分之 16。瀰漫性大型 B 細胞淋巴癌是非何杰金氏淋巴癌中最常見的次分類,約占百分之 24。根據淋巴癌原發的部位,原發積液淋巴瘤定義為惡性淋巴增生在體腔部位而沒有體腔外的腫塊,發生率約占總淋巴癌的百分之 7。常見侵犯部位在肋膜腔、腹膜腔、心包膜腔及甚至在腦脊髓液中,並且與人類疱疹病毒第 8 型感染有密切相關。我們報告一例 57 歲男性診斷為瀰漫性大型 B 細胞淋巴癌合併淋巴結外侵犯及肋膜積水,本身無人類免疫缺乏病毒感染且非器官移植的接受者。然而,血清學上指出病人有 C 型肝炎病毒感染。在第三次輔助性化學治療(R-CHOP)結束後他的肋膜積液的症狀得到完全緩解。(胸腔醫學 2017; 32: 226-231)

關鍵詞:瀰漫性大型 B 細胞淋巴癌,非何杰金氏淋巴癌,原發積液淋巴瘤

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# Angiosarcoma of the Pericardium Presenting with Recurrent Pneumothorax: A Case Report and Review of the Literature

Ying-Shou Chen, Chien-Wei Hsu, Huai-Pao Lee\*, Szu-Pei Ho\*, Rui-Sheng Lai

Angiosarcoma is the most common primary malignant type of primary cardiac neoplasm. It is an extremely rare condition that arises from the pericardium even more rarely than from the heart. We present the case of a 44-year-old man with progressive bilateral infiltration of the lungs, recurrent pneumothorax, and multiple brain nodules. Transthoracic echocardiography revealed a suspicious mediastinal mass lesion that compressed the right ventricle and caused pericardial effusion. Pericardiocentesis yielded a bloody fluid for which pathologic findings were negative. The patient underwent palliative surgery for cardiac tamponade and advanced biopsy. Pathology confirmed a pericardial angiosarcoma. The prognosis of this disease is usually poor. Surgical resection is the primary treatment for localized cancer. As yet, no randomized, controlled trials have established the roles of chemotherapy, radiotherapy, and immunotherapy for this rare disease. *(Thorac Med 2017; 32: 232-237)* 

Key words: cardiac tumor, pericardial angiosarcoma, pneumothorax

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#### 臨床表現爲反覆性氣胸之心包膜血管內瘤: 病例報告與文獻回顧

陳映守 許健威 李懷寶\* 何思蓓\* 賴瑞生

原發性心臟惡性腫瘤相當罕見。其中以血管肉瘤為最常見的組織型態。而心包膜的血管肉瘤更為罕見。我們報告一名 44 歲男性病患,以反覆性氣胸、進展性肺浸潤與腦部結節來表現。經胸腔心臟超音波顯示疑似縱膈腔腫瘤合併右心壓迫與心包膜積液。心包膜穿刺抽取積液呈現出血但是細胞病理為陰性。為治療心包膜填塞與取得檢體,病患接受緩解性手術。病理結果證實為血管肉瘤。血管肉瘤的預後非常差。若腫瘤為侷限性,仍以手術為主要治療方法。也由於該疾病相當罕見,故仍無大型研究去證實其他治療,如化學治療、放射治療與免疫治療等療效。(胸腔醫學 2017; 32: 232-237)

關鍵詞:心臟腫瘤,心包膜血管肉瘤,氣胸

### Reversed Halo Sign in Cryptogenic Organizing Pneumonia: A Case Report and Literature Review

Chiu-Fan Chen\*, Huai-Pao Lee\*\*,\*\*\*, Kuo-An Chu\*, Ruay-Sheng Lai\*,\*\*\*\*

The reversed halo sign is a computed tomography image pattern characterized by a central ground-glass opacity surrounded by a complete or near-complete ring of consolidation. It is a rare and special sign of organizing pneumonia. Although an increasing number of other pulmonary diseases have been reported to have this image pattern, organizing pneumonia still accounts for the largest number of cases. Here, we report a typical case of reversed halo sign in biopsy-proven cryptogenic organizing pneumonia, and briefly review the current literature regarding this rare image pattern. Other important differential diagnoses for a reversed halo sign are tuberculosis and invasive pulmonary fungal infections. Immune status and several associated radiological features could effectively differentiate possible causes. The reversed halo sign in tuberculosis is always associated with nodular lesions on or within the rim. The reversed halo sign in invasive pulmonary fungal infection occurs mostly in immunocompromised patients, and is strongly associated with ring thickness > 1 cm, reticulation within the lesion, and pleural effusion. Based on these factors, we suggest the reversed halo sign is very useful as a guide for the diagnosis of organizing pneumonia, tuberculosis, and invasive pulmonary fungal infections. (*Thorac Med 2017; 32: 238-244*)

Key words: computed tomography, cryptogenic organizing pneumonia, reversed halo sign

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#### 反暈徵表現在原因不明器質化肺炎之個案報告及文獻回顧

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反暈徵為環狀實質化包圍中央毛玻璃陰影的一種電腦斷層影像型態。這是器質化肺炎的一種罕見而特殊的徵象。雖然漸漸有其他疾病也發現反暈徵的型態,器質化肺炎仍佔了大多數。在此我們報告一個切片診斷原因不明器質化肺炎表現典型反暈徵的個案,並做簡短的文獻回顧。反暈徵其他重要的鑑別診斷包括肺結核和肺部侵襲性黴菌感染。免疫狀況與一些影像學相關特徵可以做有效鑑別。肺結核造成的反暈徵總是會合併結節病灶。肺部侵襲性黴菌感染造成的反暈徵則大多發生在免疫功能不全患者,而且和圓環厚度大於1公分、內部網狀陰影、及肋膜積水有強烈相關。依據這些規則,反暈徵對於器質化肺炎、肺結核及肺部侵襲性黴菌感染的診斷是非常有用的。(胸腔醫學 2017; 32: 238-244)

關鍵詞:電腦斷層掃描,原因不明器質化肺炎,反暈徵

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