

Report of Stage-specific Survival of Lung Cancer in Hong Kong

本港肺癌分期存活率彙報

Cancer is the top killer in Hong Kong. Among all, lung cancer was the most common diagnosed cancer and the leading cause of death in the last decade. According to our data, the survival rate of lung cancer was heavily affected by gender, age and stage at diagnosis.

This summary report provides the survival statistics of lung cancer diagnosed in 2010-2020, with follow-up to 31st December 2022. Due to the implementation of 8th edition of American Joint Committee on Cancer (AJCC) Cancer Staging Manual in 2018, only those cases diagnosed during 2014-2017 were included in the stage-specific survival analysis and were staged according to staging system in 7th edition of AJCC. The stage-specific survival rates of lung cancer diagnosed from 2018 onwards will be released when more data are being collected in the future.

癌症是香港的頭號殺手。在眾多癌症當中，肺癌是過去十年最常見的癌症及主要死因。根據我們的數據，肺癌的存活率在很大程度上受到性別、確診年齡和癌症期數的影響。

本年度的分期存活率彙報提供了 2010-2020 年期間確診肺癌的患者截至 2022 年 12 月 31 日的存活統計數據。由於美國癌症聯合委員會 (AJCC) 於 2018 年發布了最新版本的癌症分期系統 (第 8 版)，此報告僅將 2014-2017 年確診及根據 AJCC 第 7 版中的分期系統分類的病例納入分期存活率分析。當本中心陸續收集更多的數據後，將會更新發布自 2018 年之後確診肺癌患者的分期存活率資料。

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Statistical Terminology 統計學詞彙

There are two types of survival measures being described in this report:
本報告描述了兩種存活率：

- **Observed survival (OS)** is the proportion of patients surviving for a specified time interval after the diagnosis of cancer, regardless of the cause of death.
- **整體存活率**是指從確診開始若干年後的存活百分比。
- **Relative survival (RS)** is the proportion of cancer patients surviving for a specified time after the diagnosis of cancer, compared to people without cancer in the general population. RS is the most commonly used method to measure survival of people with cancer in a population.¹
- **相對存活率**是指與相同性別和年齡的一般人口比較後的存活率百分比。這是計算以人口為基礎的癌症患者存活率中最常用的方法。¹

Examples for a particular cancer 範例：

Period of diagnosis 確診年份	Observed survival 整體存活率		Relative survival 相對存活率	
	1-year 一年	5-year 五年	1-year 一年	5-year 五年
2010-2020	55%	20%	60%	25%

Observed survival 整體存活率

Among patients diagnosed with a particular cancer in 2010-2020, 55% were alive after one year and 20% survived five years or more.

在 2010-2020 年中確診某種癌症的患者中，一年後仍然活著的佔 55%，而存活五年或更久的患者佔 20%。

Relative survival 相對存活率

Compared to people without cancer in the general population, 60% of the patients who were diagnosed with this cancer during 2010-2020 would survive after one year and 25% would survive five years or more.

與一般人口比較後，在 2010-2020 年間確診某種癌症的患者中，有 60% 可以存活一年，而 25% 的患者可以存活五年或更久。

For more statistical terminology, please refer to the website of Hong Kong Cancer Registry, Glossary:
更多統計學詞彙的詳解，請瀏覽本中心網站：
<https://www3.ha.org.hk/cancereg/glossary.html>

¹ Relative survival rates are age-adjusted to the International Cancer Survival Standard Weights

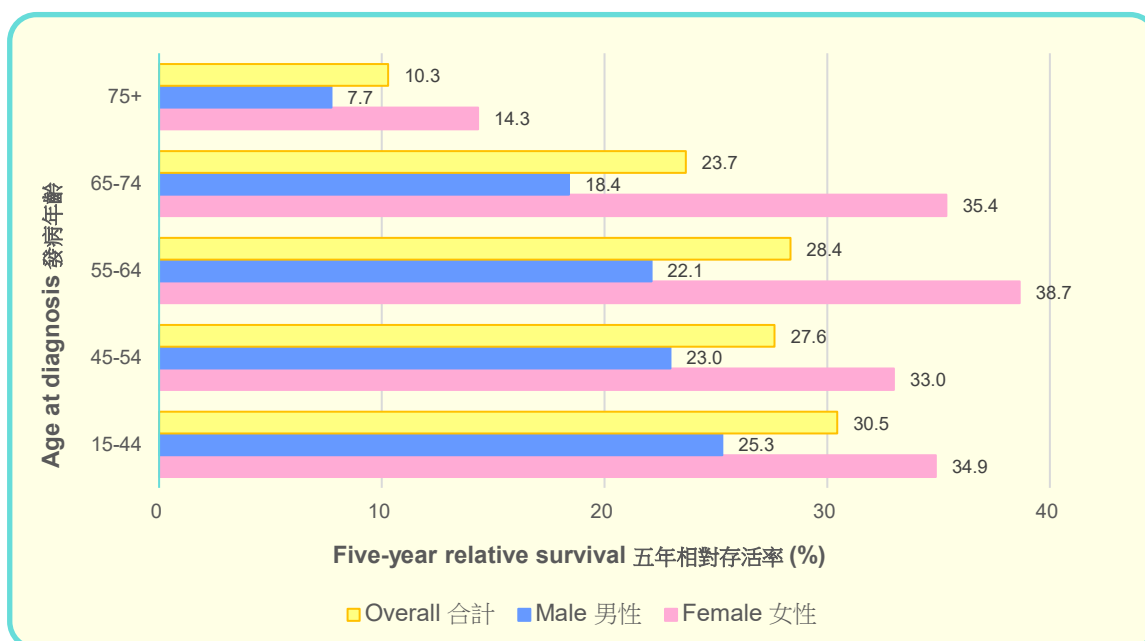
¹ 相對存活率以國際癌症存活標準比重 (ICSS) 的標準年齡作出調整



The following table shows the survival rates of lung cancer patients who were diagnosed in 2010-2020:
 下表顯示在 2010-2020 年間確診肺癌患者的存活率：

Period of diagnosis 確診年份	Gender 性別	Observed survival 整體存活率		Relative survival 相對存活率	
		1-year 第一年	5-year 第五年	1-year 第一年	5-year 第五年
2010-2020	Overall 合計	50.0%	18.5%	54.0%	21.8%
2010-2020	Male 男性	43.5%	14.1%	47.2%	17.2%
2010-2020	Female 女性	61.3%	25.9%	65.4%	29.7%

Survival by Gender and Age at Diagnosis: Lung Cancer in 2010-2020
 按性別及年齡分布相對存活率：2010-2020 年肺癌患者



- Survival from lung cancer was the worst in the age group of 75 or above, compared to other age groups.
- 在眾多年齡組別中，75 歲或以上確診肺癌患者的五年存活率明顯較低。
- Survival from lung cancer was relatively better in female patients than in male patients in any age groups.
- 女性肺癌患者在任何一個年齡組別的存活率比男性患者較高。

Survival by Stage at Diagnosis: Lung Cancer in 2014-2017 按期數分布相對存活率：2014-2017 年肺癌患者

The following table lists out the number of cases and 5-year relative survival rates of lung cancer patients who were diagnosed in 2014-2017 according to the stages at diagnosis:

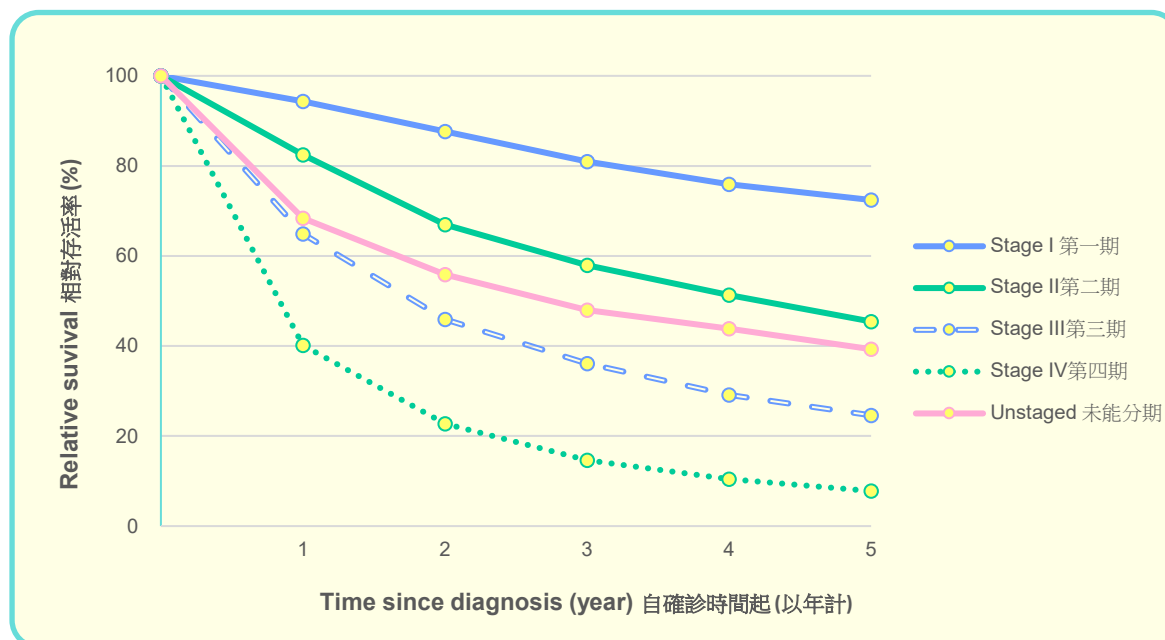
下表列出在 2014-2017 年間確診不同期數的肺癌患者總人數和五年相對存活率：

Stage at diagnosis 期數	Number of cases 確診人數			5-year relative survival 五年相對存活率		
	Overall 合計	Male 男性	Female 女性	Overall 合計	Male 男性	Female 女性
Stage I 第一期	2,616	1,387	1,229	72.4%	64.7%	81.7%
Stage II 第二期	990	669	321	45.4%	42.5%	53.2%
Stage III 第三期	2,740	2,025	715	24.6%	20.3%	35.8%
Stage IV 第四期	12,544	7,843	4,701	7.8%	5.2%	11.8%
Unstaged 未能分期	928	576	352	39.3%	30.9%	55.4%

The following table and graph show the one- to five-year relative survival rates by stage at diagnosis:

以下圖表顯示按患者確診不同期數的一至五年相對存活率：

Stage at diagnosis 期數	Time since diagnosis 自確診時間起				
	1-year 第一年	2-year 第二年	3-year 第三年	4-year 第四年	5-year 第五年
Stage I 第一期	94.3%	87.6%	81.0%	75.9%	72.4%
Stage II 第二期	82.5%	66.9%	57.9%	51.3%	45.4%
Stage III 第三期	64.9%	45.9%	36.1%	29.1%	24.6%
Stage IV 第四期	40.2%	22.7%	14.6%	10.4%	7.8%
Unstaged 未能分期	68.4%	55.9%	48.0%	43.8%	39.3%

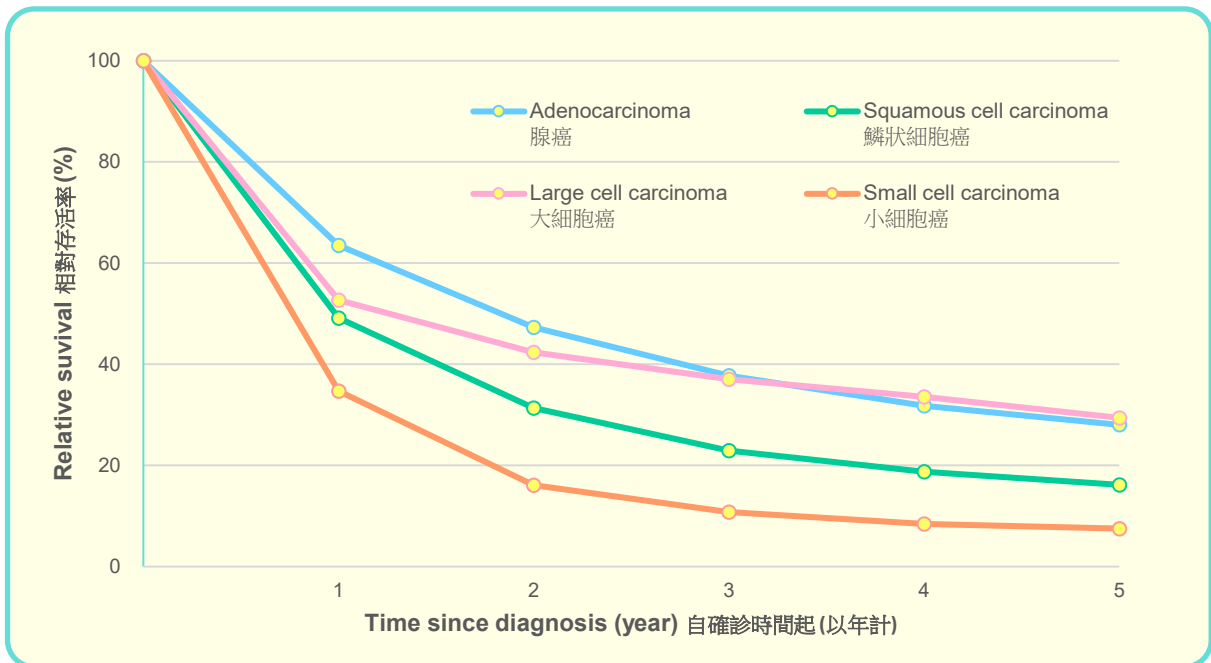


- Stage at diagnosis is one of the most important factors in lung cancer survival with survival time at all years after diagnosis decreasing as stage increases.
- 發病期數是影響肺癌存活率最重要的因素之一，期數越高存活率越低。

Survival by Histology: Lung Cancer in 2010-2020
按癌細胞形態相對存活率：2010-2020 年肺癌患者

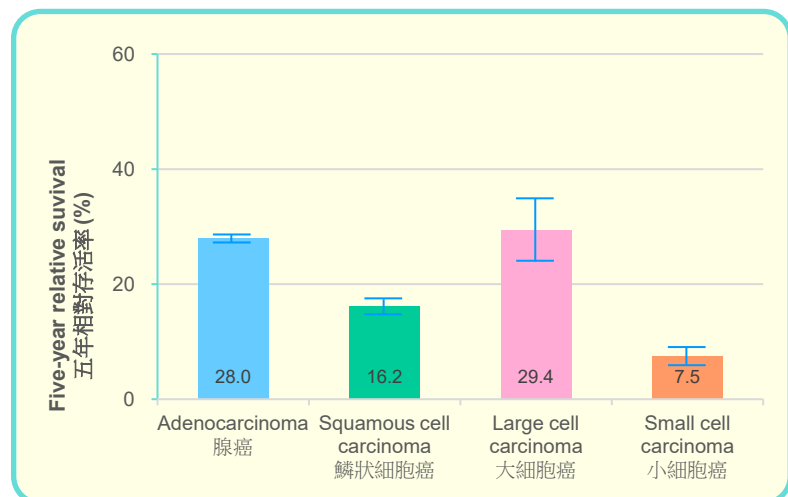
The following table and graphs show the one- to five-year relative survival rates by the major histological types:
以下圖表顯示了主要癌細胞形態類別的一至五年相對存活率：

Histological type 癌細胞組織類別	Number 數目	Time since diagnosis 自確診時間起				
		1-year 第一年	2-year 第二年	3-year 第三年	4-year 第四年	5-year 第五年
Non-small cell carcinoma 非小細胞癌	42,712	58.6%	42.5%	33.5%	28.2%	24.7%
Adenocarcinoma 腺癌	29,863	63.5%	47.3%	37.7%	31.8%	28.0%
Squamous cell carcinoma 鱗狀細胞癌	5,940	49.1%	31.4%	22.9%	18.8%	16.2%
Large cell carcinoma 大細胞癌	199	52.7%	42.4%	37.0%	33.6%	29.4%
Other non-small cell carcinoma 其他非小細胞癌	6,710	44.9%	30.4%	23.7%	19.6%	16.9%
Small cell carcinoma 小細胞癌	2,975	34.7%	16.1%	10.8%	8.5%	7.5%

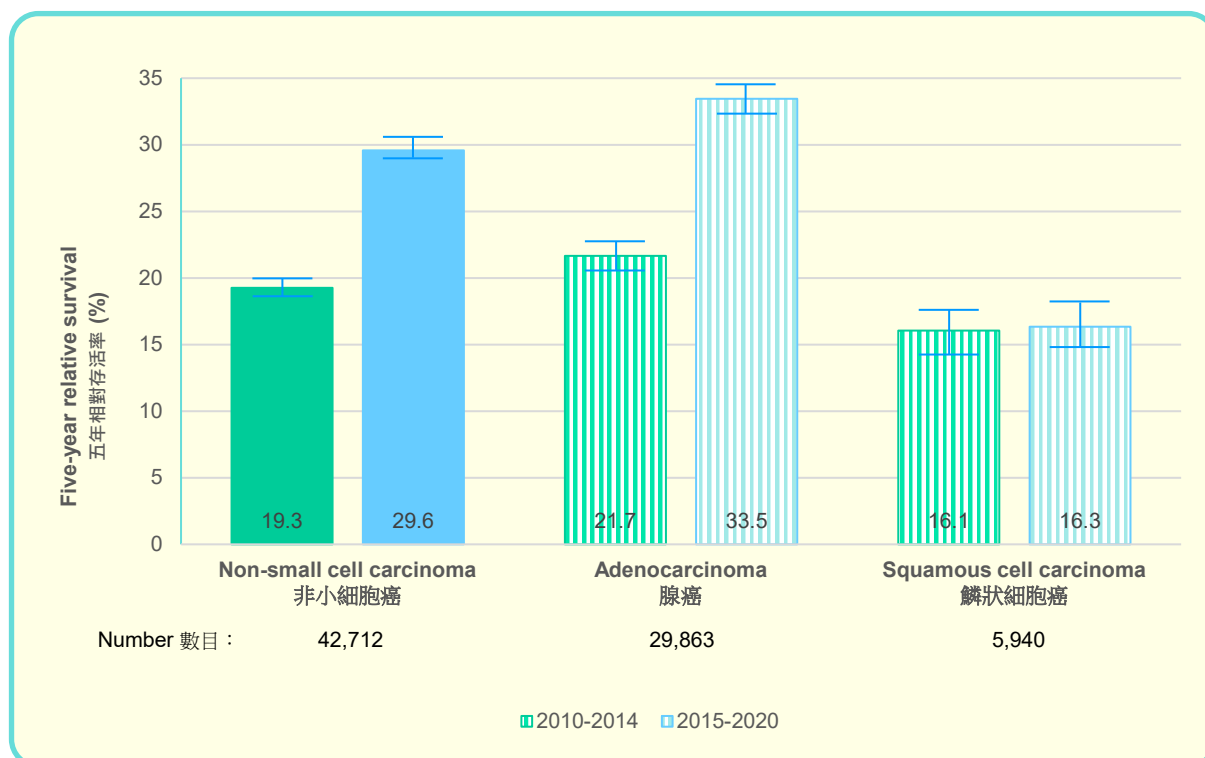


Survival from lung cancer was the worst in small cell carcinoma.

在眾多癌細胞組織類別中，小細胞癌患者的存活率最低。



Trends in Relative Survival: Lung Cancer in 2010-2020
 相對存活率近年趨勢：2010-2020 年肺癌患者



- Five-year relative survival of non-small cell lung cancer increased from 19.3% (95% CI: 18.6-19.9) for those diagnosed in 2010-2014 to 29.6% (95% CI: 28.8-30.4) for those diagnosed in 2015-2020. The difference was statistically significant.
- Survival of lung adenocarcinoma increased from 21.7% (95% CI: 20.9-22.5) for those diagnosed in 2010-2014 to 33.5% (95% CI: 32.5-34.4) for those diagnosed in 2015-2020. The difference was statistically significant.
- Survival of lung squamous cell carcinoma increased from 16.1% (95% CI: 14.2-18.0) for those diagnosed in 2010-2014 to 16.3% (95% CI: 14.4-18.4) for those diagnosed in 2015-2020. The difference was not statistically significant.
- Recent advances in targeted therapy and immunotherapy for non-small cell lung cancer patients are likely responsible for the improvement in survival.
- 所有非小細胞肺癌的五年相對存活率由 2010-2014 年的 19.3% 上升至 2015-2020 年的 29.6%，在統計學上有顯著的差異。
- 當中肺腺癌的五年相對存活率由 2010-2014 年的 21.7% 上升至 2015-2020 年的 33.5%，在統計學上有顯著的差異。
- 而鱗狀細胞肺癌的五年相對存活率由 2010-2014 年的 16.1% 上升至 2015-2020 年的 16.3%，在統計學上沒有顯著的差異。
- 近年發展的標靶治療及免疫治療可能是有效提高非小細胞肺癌患者存活率的原因。

Point to note 注意事項：

The survival statistics were based on the information of cancer patients who were diagnosed in the past, and may not reflect individual situation.

存活統計分析是基於過去確診癌症患者的數據，並不能反映個人情況。

Suggested citation 建議引用：

Hong Kong Cancer Registry. *Report of Stage-specific Survival of Lung Cancer in Hong Kong*. Hospital Authority, Hong Kong; Version 1, 2023. Available at: <https://www3.ha.org.hk/cancereg> (accessed [date]).