

# Dissecting the thorax

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Glenn Duns

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On a bright autumn day in 1990, I crossed the threshold of the anatomy building at McGill University and climbed the marble staircases up to the dissection laboratory on the second floor. An example of neo-Tudor architecture constructed in 1909 after a fire destroyed the previous medical building, the anatomy building is an impressive structure located on the slopes of Mount Royal, with views of Montreal's city centre below. Inside, vaulted ceilings, terracotta finishes, terrazzo and marble flooring, wood bannisters and stained glass windows complement the exterior.<sup>1</sup>

The dissection laboratory itself was a vast room with high, arched windows and a 20-m-long skylight, which provided ample natural light that illuminated the rows of cadavers lying on tables and covered by sheets. These individuals had donated their bodies to the medical school for the purpose of educating future doctors through cadaveric dissection, a tradition dating back thousands of years to Alexandria in the third century BC. Prior to this period, human dissection had been prohibited in much of the ancient world. People, however, are intrinsically curious, and attempts were made to understand the internal functioning of humans through indirect methods including comparison with animals, extrapolation from natural philosophy and observation of function.<sup>2</sup>

One of the more striking observations would have been the difference between the living and dead body. 'The living body is warm, it breathes, and it moves with an

innate motion and in reaction to external changes – four things it does not share with the dead body. The principle of life was therefore hot, mobile, associated with breath ...'<sup>2</sup> Where was this principle of life located? By noting the physical changes associated with exertion (the pulse races, our breath quickens and we can feel our heart pounding in our chest), it would have been natural to assume that the principle of life resides within the thorax.

Maybe then, it was appropriate that we started the dissection with the thorax. Even 25 years later, I have quite vivid memories of dissecting through the chest wall and seeing the heart and lungs for the first time. This initial visualisation was subsequently reinforced through further education in anatomy and physiology, as well as countless clinical encounters in operating theatres, intensive care units, emergency departments and general practice clinics. The thoracic conditions encountered ranged from the mild to the life threatening, and much of the clinical practice consisted of differentiating between the two.

In this issue of *Australian Family Physician*, we present a range of articles pertaining to the thorax. Winzenberg, Jones and Callisaya<sup>3</sup> offer an approach to musculoskeletal chest wall pain, a common problem that must be differentiated from potentially life-threatening conditions. Burdon<sup>4</sup> describes the condition of adult-onset asthma. Troy and Corte<sup>5</sup> present an overview of interstitial lung disease and recent advances in the treatment of interstitial fibrosis. Finally, Skinner<sup>6</sup> provides an approach to ordering and interpreting thoracic imaging.

In recent years, with the introduction of increasingly sophisticated computer programs and graphics that allow for the teaching of anatomy on computers, there has been debate over the continued use of cadaveric dissection as a teaching tool for all medical students.<sup>7</sup> Some medical schools have removed cadaveric dissection from their standard curriculum and included it only as an optional elective. Personally, I have found that this experience played an essential part in the development of my medical perception. Perhaps more importantly, this traditional method can help instil a respect for life and death as students cross the threshold on the long journey to becoming doctors.

## Author

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