

## Technological and artistic convergence

### Introduction

- 5.1 This chapter will report on item (f) in the terms of reference:
- the effectiveness of the existing linkages between these industries and the wider cultural and information technology sectors.
- 5.2 Links between the industries featured in the inquiry are not new. For example, the film *Mary Poppins* (1964) featured stop-motion animation. The film *Bedknobs and Broomsticks* (1971) used traditional cartoon animation. Special effects have been used in film since *King Kong* (1933).
- 5.3 However, there are new dimensions to convergence in these industries. Firstly, it has soon become apparent that just as films are often sourced from books, so can electronic games be sourced from films. It is now 'commonplace' to spin off games from films. Further, films can be spun off from games, examples being *Tomb Raider* and *Mortal Kombat*. Finally, some films and games are simultaneously developed, two examples being *Matrix* and *Lord of the Rings*. In these cases, simultaneous development allowed the producers to ensure the consistency of characters, storyline, and look and feel of the respective games and films.<sup>1</sup>
- 5.4 The benefit of these game/film spin-offs is the one piece of intellectual property can be exploited many times over. In one case, the Committee heard that some games may ultimately generate more revenue than the film from which they are derived.<sup>2</sup>

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1 Austrade, submission no. 37, p. 14.

2 Mr I. Robertson, AusFILM International, *Transcript of Evidence*, 4 September 2003, p. 52.

- 5.5 Further, the technology is converging, with more and more forms of audio-visual expression being converted from analogue into digital format. Music came first, with the Fairlight sampler and compact disc. Soon after followed special effects, then animation with productions such as the locally produced *The Shapiers*. Television has recently followed suit. During this inquiry, the Committee heard how digital cinema will eventually replace 35 mm film.<sup>3</sup> In the digital sense, these industries are catching up to electronic games, which predated them all with *Pong* and *Space Invaders*.
- 5.6 The benefit here is the one image or piece of sound can be used many times over in different applications. Hence, companies can obtain significant efficiencies by using the same basic material in different applications.
- 5.7 Finally, games are adopting other industries' techniques to improve their products, such as motion capture to improve their animation. A popular game, *Grand Theft Auto: Vice City*, used Hollywood actors such as Ray Liotta, Dennis Hopper, Burt Reynolds and others.<sup>4</sup> The Australian actor, Bud Tingwell, worked on the game *Jurassic Park: Operation Genesis*.<sup>5</sup>
- 5.8 The Committee found, however, that despite these expectations, links in Australia are less developed than in the international examples given above. Links do exist, but they might best be described as embryonic. At this stage, it appears the games industry sees more benefit in the links and has itself initiated seminars to further encourage them. In this and the following chapter, the Committee makes some recommendations as to how these initial links can be better developed.

## Current links

### Progress to date

- 5.9 The general tenor of the evidence the Committee received was that the film, animation and special effects industries were linked to some extent, but that games were regarded as largely separate. The mechanics of these links were neatly summarised by Cutting Edge Post:

There are existing linkages between all of the areas above but more realistically the games industry is considered almost a separate

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3 Media Entertainment Systems Architects, submission no. 30, p. 1.

4 Austrade, submission no. 37, p. 14.

5 Film Victoria, submission no. 85, p. 13.

industry to the rest. However often individual artists and technicians can make the transition from one area to the other.

Film, animation and special effects can all be part of the same production and hence work closely together. At Cutting Edge Post we have artists who work some weeks on special effects and other weeks on animation.<sup>6</sup>

- 5.10 This transferability of staff in the sector is consistent with evidence the Committee received from the Screen Tasmania Advisory Board. Between 2000 and 2003, the Tasmanian industry's turnover grew from \$26,000 to \$5 million. The Tasmanian industry was able to enjoy this rapid growth by taking in people with related skills. Stills photographers started shooting movies and advertisement copywriters started developing feature film scripts.<sup>7</sup>
- 5.11 The Committee received evidence from a number of sources that the electronic games industry is looking to the film, animation and special effects industries for expertise and input. For example, one South Australian firm stated:
- We currently have 50 staff, and we are now hiring more people. We are branching out into global titles that include action drama and involve a lot more story as well, so we are beginning to use a lot of people from the film industry in our development. In fact, we have become dependent, to some extent, on skills in the film industry. For example, we use screenwriters, editors and post-production houses, animators, voice actors; a whole range of creative people from film and TV to help us make our games. The games are focusing much more on story.<sup>8</sup>
- 5.12 The firm also noted that outsourcing animation and modelling work allowed it to minimise its risk.<sup>9</sup>
- 5.13 This developing link between the game industry and the other industries examined in this inquiry was confirmed by a number of organisations, including Austrade<sup>10</sup> and Film Victoria.<sup>11</sup>
- 5.14 In its submission, the Game Developers' Association of Australia (GDAA) noted the importance of these links. It has hosted a number of events to

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6 Cutting Edge Post, submission no. 20, p. 4.

7 Ms M. Reynolds, Screen Tasmania Advisory Board, *Transcript of Evidence*, 30 September 2003, pp. 20-21.

8 Mr G. Siegele, Ratbag Services, *Transcript of Evidence*, 30 September 2003, p. 2.

9 *ibid.*, p. 6.

10 Austrade, submission no. 37, p. 10.

11 Film Victoria, submission no. 85, p. 10.

promote them in association with Melbourne City Council, Multimedia Victoria, the Information Industries Bureau, Brisbane City Council and others.<sup>12</sup> The reverse level of interest from the film and other sectors in the game industry will be discussed below.

- 5.15 The ABC has also sought to encourage these links. In conjunction with Film Victoria, it launched *Game On*, a grant program to encourage film makers, animators and game designers to develop online games. The ABC made five grants of \$25,000 to develop a narrative game. One game, *Kelman to the Rescue*, won three international awards. One of the games was under negotiation for development as an animated series.<sup>13</sup>
- 5.16 The Committee also received some evidence on the industries' links with the wider economy. For example, the Queensland industry, largely centred on the Gold Coast, has links to the local leisure industry.<sup>14</sup>
- 5.17 The arts sector is also developing links. Artists use game technology to develop interactive displays.<sup>15</sup> The new Adelaide Film Festival has a broad focus on digital production. The Australian Network for Art and Technology is based in South Australia and fosters innovation 'at the creative end of new media.'<sup>16</sup>

## Room for improvement

- 5.18 As previously discussed, one of the key findings in relation to links was that, despite the games industry looking to learn from the film, animation and special effects industries, it is still largely regarded as separate. For example, a significant number of the submissions from established organisations in the film industry did not refer to the games industry.<sup>17</sup>
- 5.19 In its submission, Austrade noted that the film industry is in a more advanced stage of development, which means the games industry would perceive greater opportunities from this convergence.<sup>18</sup>

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12 GDAA, submission no. 54, p. 13.

13 ABC, submission no. 22, p. 6.

14 Gold Coast City Council, submission no. 53, p. 6.

15 Australia Council, submission no. 84, p. 2.

16 Government of South Australia, submission no. 94.1, pp. 3 & 7.

17 Examples are the Pacific Film and Television Commission (submission no. 47); NSW Film and Television Office (submission no. 56); Australian Film Commission (submission no. 58); Media Entertainment and Arts Alliance (submission no. 59); Film Finance Corporation (submission no. 70); Australian Screen Directors Association and Australian Writers' Guild (submission no. 74); Film Australia (submission no. 82); and AusFILM (submission no. 88).

18 Austrade, submission no. 37, p. 14.

- 5.20 One factor that would make it more difficult for the games industry to develop links with its more traditional counterparts is that the industries are concentrated in different states. Electronic games firms are concentrated in Victoria and Queensland.<sup>19</sup> The film industry, however, is concentrated in Sydney.<sup>20</sup>
- 5.21 The stage two report of the creative industries cluster study noted that a similar phenomenon had occurred in other countries. Noted game development centres include Lyon, but not Paris, and Manchester, but not London. Some industry players suggested that film centres (such as Sydney) absorb all the talent. The study, however, did not wish to express an opinion on this state of affairs. Instead, it preferred to note the possibility that these centres may be an exercise in regional branding.<sup>21</sup>
- 5.22 The Committee would like to note that some film organisations did appreciate the value of the links with the games industry. Film Victoria's submission discussed the games industry.<sup>22</sup> When the matter was raised in evidence, the Film Finance Corporation Australia (FFC)<sup>23</sup> and AusFILM<sup>24</sup> recognised they could have a role to play in assisting the electronic games industry.
- 5.23 The Committee also received evidence of a lack of understanding between the technology and artistic sectors.<sup>25</sup> These two groups are generally involved in seeking to address the same particular problem, but from greatly different perspectives. The Committee received evidence from QPIX about the potential uses of imaging technology in a whole range of industries outside the entertainment sector:

These industries include defence, mining, medicine (in particular genetic technologies), aerospace, architecture, engineering and many others. At this time, the use of these technologies by the industries above is limited largely to the formulaic opportunities provided for by the software itself. The insertion of originating filmmakers into this process would enhance the quality of the resulting virtual and simulated work, but also the narrative substance of them, this significantly increasing their effectiveness

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19 *ibid.*, p. 21.

20 Mr G. Brennan, NSW Film and Television Office, *Transcript of Evidence*, 4 September 2003, p. 32.

21 Cutler & Company *Producing Digital Content*, September 2002, pp. 24-25, viewed at [http://www2.dcita.gov.au/ie/environment/drivers/creative\\_industries](http://www2.dcita.gov.au/ie/environment/drivers/creative_industries) on 20 April 2004.

22 Film Victoria, submission no. 85, p. 16.

23 Mr B. Rosen, FFC, *Transcript of Evidence*, 5 November 2003, p. 11.

24 Mr I. Robertson, AusFILM International, *Transcript of Evidence*, 4 September 2003, p. 51.

25 Yoram Gross-E.M.TV, submission no. 63, p. 8.

in predictive, modelling, training, and other industrial environments. It would also open up those industries for employment and contract opportunities for screen practitioners.<sup>26</sup>

5.24 Austrade noted this process had commenced but also added a sense of urgency:

The X/media/lab project is one that is seeking to break down these barriers. There are some opportunities for artists and technical people to work together but there could be more. Cost advantages will not continue to win Australia the business – we need to be at the leading edge with content and creativity. Integration between technology specialists, universities, workshops/laboratories and creative artists is essential.<sup>27</sup>

5.25 Just as industrial design can make home products more attractive and functional, film makers and other practitioners from this sector can make their mark on technological products.

5.26 Both the technology and the creative sectors stand to gain from such an approach. Technology firms would develop more user-friendly and effective products. Creative people would gain more employment options, many of which might be more stable than the traditional outlets for their skills.

5.27 The Australian Government has recently commenced supporting this approach by funding the Cooperative Research Centre for Interaction Design. This Centre is further discussed in Chapter 6, but is essentially a research and development facility that aims to enhance technological products through a creative perspective.

5.28 The Committee is of the view that the Government can build on this promising start and further investigate how it might be able to help the technology sector leverage the skills of our creative people.

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## **Recommendation 22**

**5.29 The Committee recommends that the Department of Communications, Information Technology and the Arts develop a plan with the creative and technological industries, education institutions and the CRC for Interaction Design that will establish and promote greater links between the creative and technology sectors.**

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26 QPIX, submission no. 23, p. 7.

27 Austrade, submission no. 37, p. 7.

## Effectiveness of the links

### Spin-offs

- 5.30 The previous discussion noted that the games industry has been drawing off the film, animation and special effects industries in relation to skills and expertise. In this sense, the links are starting to be effective.
- 5.31 Overseas practice, however, has shown that these links can deliver much more, such as games or films being spun off from each other. To date, the Committee is not aware of any Australian spin-offs, although it is aware of a lost opportunity:

Ratbag was approached by a Sydney producer to make a game based on a film that is about to enter pre-production. The concept is perfect for the games medium. The budget for the film is \$30M and will feature at least one major star, giving it global appeal. The producer's financier wanted to raise the additional finance for development of the game from their investors but then withdrew when we told them that games are not eligible under [Division 10BA of the *Income Tax Assessment Act 1936*].

The film and the game would have been released simultaneously creating two substantial benefits:

- two revenue streams for the property; and
- the film and the game cross promoting each other.<sup>28</sup>

- 5.32 As the Allen Consulting Group stated, these spin-offs provide a much greater return for the investment in the intellectual property. In evidence, the Committee heard that one of the Matrix films earned \$US77 million in its opening week, but at the same time the publishers shipped \$US80 million of game sales.<sup>29</sup>

- 5.33 This issue was neatly summarised by the GDAA:

In the US, the relationship between the various entertainment sectors, particularly film and games, is much stronger and the industry is driven by "franchise" product, ie film, game, merchandising, music CD, books, comics etc all packaged together. In Australia, there is currently limited "franchise" property potential plus there is a need for the sectors to better

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28 The Allen Consulting Group, *Game Industry Development Strategy*, 8 October 2003, p. 25.

29 Mr R. Walsh, Krome Studios, *Transcript of Evidence*, 24 July 2003, p. 40.

understand the respective business models and synergies between them.<sup>30</sup>

- 5.34 The Committee considers these comments are consistent with the evidence put before it in this inquiry.
- 5.35 Another factor to consider is the profitability of electronic games. As discussed in Chapter 4, games are generally a better commercial prospect than films because it is easier to modify them while they are being developed and, at this stage of the industry's development, sequels are often better than the original.
- 5.36 The local film industry, however, has not always been producing the type of intellectual property that easily transfers to a game. In evidence, the FFC noted that film budgets in Australia have tended to be low (no more than \$10 million to \$12 million), which means that action films are difficult to make. Action films, however, translate easily across to the game format.<sup>31</sup>
- 5.37 These issues and the Committee's recommendations are further discussed in Chapter 6.

## Industry structure

- 5.38 As noted in Chapter 2, the industries examined in this inquiry are largely small and medium enterprises (SMEs). Of the number of firms in the sector, 90.5 per cent have less than 10 staff.<sup>32</sup> This industry structure has a number of consequences, which are discussed throughout this report. One of those consequences is that, because the firms are generally small, they are less likely to be multi-disciplinary and more likely to cover just one field. The former National Office for the Information Economy made this point in evidence:

One of the major problems in the sector in Australia is the issue of scale. It is exacerbated by significant fragmentation within the sector. Exacerbating that is the persistence of some old industry silo thinking around film being different from games being different from animation and so on. One of the things that has emerged from the research over the last two years has been that we are seeing, because of digital technology, a convergence in production practice across all of those sectors. So in fact there is an opportunity here for the industry and the sector as a whole to

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30 GDAA, submission no. 54, p. 14.

31 Mr B. Rosen, FFC, *Transcript of Evidence*, 5 November 2003, pp. 2 & 11.

32 FIBRE, submission no. 50, p. 3.



develop a much more collaborative and consolidated approach to its own development in this country. I do not think we are at that stage yet.

I still think there are some legacy mindsets about “I am in film” or “I am in games” in a lot of cases that are holding back collaboration that could be very profitably pursued. In fact, the sector has not yet figured out how to use that commonality of technology and production practice to get some real critical mass and some synergies going within the sector. If they successfully achieve that, they could achieve great things. But if they fail to achieve that, of course a lot of the problems they are facing now will persist.<sup>33</sup>

- 5.39 One of the points from this evidence is that, as long as the industries examined in this inquiry continue to exist as SMEs, the chances of developing links across the sector are reduced. The structure of an industry is largely up to its constituents and generally follows their perceptions of the most profitable course of action.

## Conclusions

- 5.40 The commercial realities of games and films are quite different and, therefore, there are likely to be limits to convergence. As *The Economist* noted:

...the main trend will continue to be to make games from films, not vice versa. Indeed...publishers are starting to think twice about selling the rights to their games, since a bad film adaptation – over which the game publisher has little control – can tarnish a lucrative game franchise. There could turn out to be limits to the cosiness between the two industries after all.<sup>34</sup>

- 5.41 As this chapter has noted, however, the links in the Australian sector are behind international practice and these links, in the view of the Committee, should be expanded. The Committee received a suggestion from the ABC for a cross-platform fund.<sup>35</sup> Some possibilities for using existing programs to promote links within the sector are discussed in Chapter 6.

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33 Mr D. Kennedy, National Office for the Information Economy, *Transcript of Evidence*, 15 October 2003, p. 7; (NOIE has been replaced by the Australian Government Information Management Office).

34 *The Economist*, ‘Gaming goes to Hollywood’, 27 March 2004, p. 64.

35 Ms L. Marshall, ABC, *Transcript of Evidence*, 27 August 2003, p. 14.

- 5.42 One cost-effective action that the Government could consider would be to build on the seminars run by the GDAA. The effectiveness of such seminars often relies on suitable promotion and the attendance of senior and reputable personnel. These are issues that Government agencies may be able to address.

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**Recommendation 23**

- 5.43 **The Committee recommends that the Department of Communications, Information Technology and the Arts work with the film and creative agencies to ensure that the ‘industry link’ seminars established by the Game Developers’ Association of Australia are adequately promoted and attended by senior figures from the relevant industries.**