### IP + IT LECTURES

Note: for essay question - need familiarity with the debates around the impact of AI on IP

#### DIGITAL TRANSFORMATION

#### SIGNIFICANCE OF IP

The top 5 IT companies combined now have a combined GDP equivalent to the fifth country in the world. As a result, the cost of business software privacy is very high.

### DIGITAL TRANSFORMATION OVER THE LAST DECADE

Information goods are now distinguished from physical goods. These two types of goods are consumed in different ways (i.e., consumption of an information good is not consumption of a non-information good).

Digital means of transformation mean perfect reproductions, unlimited copies, no geographic limitations, and rapid, near instantaneous transmission of content around the world.

#### SOCIETAL BENEFITS OF TRANSFORMATION

Information consumption doesn't diminish that information (except confidential information). Information has a public benefit – creativity is the result of the recombination and recontextualization of existing ideals.

## DIGITAL CHALLENGES TO TRADITIONAL REGIMES

- Easy to reproduce.
- Easy to convert to new formats.
- Easy to transmit to others (one-to-many, many-to-many).
- Easy to bypass originator of work.
- Easy to alter.

## Relevant opinion:

- "If our property can be infinitely reproduced and instantaneously distributed all over the planet without cost, without our knowledge, without its even leaving our possession, how can we protect it? How are we going to get paid for the work we do with our minds? Since we don't have a solution to what is a profoundly new kind of challenge and are apparently unable to delay the galloping digitization of everything not obstinately physical, we are sailing into the future on a sinking ship" John Perry Barlow.
- "Of all the creative work produced by humans anywhere, a tiny fraction has continuing commercial value. For that tiny fraction, the copyright is a crucially important legal device. For that tiny fraction, the copyright creates incentives to produce and distribute the creative work. For that tiny fraction, the copyright acts as an engine of free expression" Lawrence Lessig.

IP rights are created not inherent.

The general proposition is that unless one can bring oneself within some existing form of action or protection, knowledge and information are not the property of an individual. The creation of a value through the exercise of skill and labour doesn't of itself entitle somebody to a property right in the product of that labour and skill. The exercise of labour and skill has to be brought into some existing category of protection (*Victoria Racing Park and Recreation Grounds v Taylor* 58 CLR 479).

#### TOP LEVEL APPROACHES TO IT PROTECTION

### LEGAL APPROACHES

- 1. Patents (extensive monopoly on novel method of manufacture).
- 2. Circuit layouts (similar to patents, specifically for Integrated Circuits).
- 3. Designs (non-functional appearance of a product shapes/patterns).
- 4. Copyright (automatic monopoly on public expressions of work).
- 5. Trade secrets (protection based around confidentiality of information).
- 6. General contract law (can include Open-Source terms and conditions).

Copyright for software	Patent for software
Both protect the original expression of (un)original ideas.	
No requirement that the idea be novel	Requires a "novel" step
Protects the expression	Protects the idea/process
Automatic, free, no registration required	Cost \$\$\$, require registration, application
	process.
Protection duration = life of author + 70	Protection duration = up to 20 years from
years	patent grant.

# NON-LEGAL APPROACHES

- 1. First mover advantage.
- 2. Scaling Up and the Positive Spiral.
- 3. Network effects e.g., Facebook, AirBnB.
- 4. Customer lock in.
- 5. Controlling the bottleneck between supply and demand.

# **PATENTS**

## IP summary:

• Australian patent law has evolved since the 17th century, when patents were used in literary works to grant rights in essential titles and then divided as 'shares.' With disruptions to authorial property concepts in the late 20th century, legislation, together with the common law, worked towards protecting the rights and broader functional existence of innovators and their creative processes under the Patents Act 1900 (Cth). Today, the Intellectual Property Laws Amendment (Raising the Bar) Act 2012 (Cth) has elevated the quality of patent standards by making registration more

- difficult to obtain for obvious or unclear inventions by emphasising the 'innovation patent.'
- No longer a need for a vendible, concrete product for a patent need an artificial state of affairs with a practical economic effect and inventive step, viewed from the perspective of a person skilled in the relevant industry (*National Research Development Corporation v Commissioner of Patents*). This provides greater flexibility for inventors seeking protection in upcoming industries.
- Unpatentable areas of invention have been held to include genetic material (*D'Arcy v Myriad Genetics Inc*), schemes, rules or methods for performing a mental act, methods of calculation and methods of surgery and other processes for treating the human body (s 18(2)).
- Requirements for patent application specification, publication, and public inspection.

Patents protect novel ideas by forcing their disclosure (make 'patent)'. They are governed by the *Patents Act 1900* (Cth).

To patent something births a right to commercially exploit a novel/inventive/useful device/substance/method/process. The right is an exclusive right lasting up to 20 years (although note innovation patents shorter; easier).

The patent holder can prevent others from applying the knowledge that is protected by the patent.

The patent holder can sell the patent or grant licenses.

# PATENTS ACT 1900 (CTH)

## SECTION 18—PATENTABLE INVENTIONS FOR THE PURPOSE OF A STANDARD PATENT

- (1) Subject to subsection (2) [about human beings, genes], an invention is a patentable invention for the purposes of a standard patent if the invention, so far as claimed in any claim:
  - a. Is a **manner of manufacture** within the meaning of section 6 of the Statute of Monopolies; and
  - b. When compared with the prior art base as it existed before the priority date of that claim:
    - i. Is **novel**; and
    - ii. Involves an inventive step; and
  - c. Is useful; and
  - d. Was **not secretly used** in the patent area before the priority date of that claim by, or on behalf of, or with the authority of, the patents or nominated person or the patentee's or nominated person's predecessor in title to the invention.

#### MANNER OF MANUFACTURE

Methods of calculation/maths operations are not patentable (i.e., can't pattern a law of nature). Artistic creations can't be patented. Plans, schemes, or purely mental methods may not be patented.

Re G.E.C.'s Application (1942) 60 RPC 1, per Morton J: