## Definition

# **Lexical Cohesion**

Discourse Analysis – Lecture 4

- Lexical cohesion refers to the ties created between lexical elements, such as words and phrases.
- These lexical ties can occur over long passages of text or discourse.
- The primary types of lexical cohesion are: reiteration and collocation.

# A) Reiteration

• Includes repetition, synonymy, antonymy, hyponymy, meronymy...

## A.1. Repetition

- Using the same word over again, but not restricted to the same morphological form:
   E.g. using run (V), run (N), ran, running, runner, etc., all within the same text.
- Example 1:

- John met a **bear**. The **bear** was brown.

# A.1. Repetition

• Example 2:

The key to good, healthy studying is having breaks. Even short breaks can be very beneficial. A student ought to have a five minute break every hour. He can spend it watching TV, eating, drinking, relaxing or even taking a bath to stress out. Regular breaks are an important method for successful studying.

# A.1. Repetition

## • Example 3:

Pick up a handful of soil in your garden. Ordinary, unexciting earth. Yet it is one of nature's miracles and one of her most complex products. Your success as a gardener will largely depend on its condition, so take the first step in gardening. Get to know your soil.

Repetition chain 1: garden, gardener, gardening Repetition chain 2: soil, soil

## Exercise

#### Find the most important repeated words and phrases in the text:

A new friendlier style of Commonwealth heads of government meeting was promised yesterday. Chief Emeka Anyaoku, the Commonwealth secretary general, announced that the proceedings, which open formally tomorrow, will include a charity cricket match.

Promised participants include John Major, Bob Hawke, the Australian prime minister, Nawaz Sharif, Pakistan's prime minister and Michael Manley, the Jamaican prime minister.

But away from sport, there were signs that British hopes of improving the Commonwealth's human rights record may run into snags. (6)

R. chain 1: Commonwealth (x3); R. chain 2: prime minister (x3)

## A.2. Synonymy

- Synonym is used to mean 'sameness of meaning'.
- Lexical cohesion results from the choice of a lexical item that is in some sense synonymous or nearly synonymous with a preceding one;

E.g. sound with noise, cavalary with horses in: He was just wondering which road to take when he was started by a <u>noise</u> from behind him. It was the noise of trotting horses... He dismounted and led his horse as quickly as he could along the right-hand road. The <u>sound</u> of the cavalry grew rapidly nearer ...

## A.2. Synonymy

- Last year, my school made that day to introduce us to the <u>laws</u> and to respect the <u>regulations</u>...
- When you become an <u>adult</u> or have a permission to drive you should behave as a <u>big</u> <u>guy</u> with good thinking.

# Exercise 1 • Find near-synonyms in the text for the highlighted words:

Over the past thirty years, research in the health arena has attracted psychologists, anthropologists and sociologists. The focus of psychological research in this area is concerned with individual motives, attitudes and beliefs in relation to both health and illness. Anthropological studies, however, are concerned with culture and health care. Such studies concentrate on a conception of disease as a cultural product and on the way social and cultural life in the past affect beliefs about health and illness. In sociological studies, the emphasis is similar but focussed more on social relations within a particular social structure with respect to medical care.

Synonym chain 1: research – studies Synonym chain 2: arena – area Synonym chain 3: focus – concentrate on, emphasis Synonym chain 4: illness – disease

## Exercise 2

#### Find near-synonyms in the text for the highlighted word:

Stress is a term adopted from engineering science by psychology and medicine. Simply defined, stress in engineering means force upon an area. As so many forces are working upon us in the modern age, and we find it extremely difficult to cope under so much pressure, stress is called the "disease of civilization" and it seems that our modern world has not only created an advanced technological environment but also a stressful environment. Phillip Zimbardo, in his "Psychology and Life", traces four interrelated levels at which we react to the pressures exerted upon us from our environment.

For the key concept of 'stress' there are two synonyms in the paragraph, 'force' and 'pressure' and both are repeated once. Synonym chain:

stress force upon an area forces working on us pressure pressures exerted on us

# Exercise 3

#### • Find synonyms in the text:

Magazines are extremely effective media for promoting new consumer products to young consumers, as recent research has shown. A recent study showed 75% of teenage shoppers say they bought a product because they saw it in a magazine. One reason for this is the high proportion of magazine space given for advertisements. For example, the popular music magazine, Rolling Stone actually devotes 60% of space to push new consumer items in large advertisements. This contrasts with the low proportion of space given to advice columns or fiction. However, many teen magazines also sell products by featuring them in stories as well as in advertisements.

| There are 5 | chains: SYNO      | NYMS      |          |         |
|-------------|-------------------|-----------|----------|---------|
| 1           | 2                 | 3         | 4        | 5       |
| promoting   | consumer products | consumers | research | fiction |
| 8           | 8                 | 8         | 8        | - 8     |
| push        | consumer items    | shoppers  | study    | stories |
| 8           |                   |           |          |         |
| sell        |                   |           |          |         |

## A.3. Antonymy

- A relational antonym is one of a pair of words with opposite meanings, where opposite makes sense only in the context of the relationship between the two meanings.
- E.g. sound silence

Let's find synonyms and antonyms in the following text:

#### An apple a day keeps the doctor away

In most advanced societies, the emphasis today in health care is on prevention, not just treatment or cure. This has shifted the concerns of medicine to teaching people how to be healthy. Prevention aims at relatively uninterrupted good health for most people by avoiding serious illness. Doctors recommend healthy eating and regular exercise - fruit and vegetables and aerobic exercise every day. Of course, even people who stay well and disease-free may experience conditions which cause them serious pain, severe aches or acute discomfort. Hopefully, a high level of health means that rather than experiencing a physical decline, they make rapid improvement.

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Synonym Chain 1: healthy - well - disease free

Synonym Chain 2: serious pain – acute discomfort, severe aches Antonym Pair 1 is also related to health: good health – serious illness Antonym Pair 2 is again related to health: decline – improvement

## Exercise 1

#### Find antonyms in the text for the highlighted word:

Over the past thirty years, research in the health arena has attracted psychologists, anthropologists and sociologists. The focus of psychological research in this area is concerned with individual motives, attitudes and beliefs in relation to both health and illness. Anthropological studies, however, are concerned with culture and health care. Such studies concentrate on a conception of disease as a cultural product and on the way social and cultural life in the past affect beliefs about health and illness. In sociological studies, the emphasis is similar but focussed more on social relations within a particular social structure with respect to medical care.

Health has two antonyms in this paragraph - disease and illness.

## Exercise 2

#### Find a pair of antonyms in the text:

Magazines are extremely effective media for promoting new consumer products to young consumers, as recent research has shown. A recent study showed 75% of teenage shoppers say they bought a product because they saw it in a magazine. One reason for this is the high proportion of magazine space given for advertisements. For example, the popular music magazine, Rolling Stone actually devotes 60% of space to push new consumer items in large advertisements. This contrasts with the low proportion of space given to advice columns or fiction. However, many teen magazines also sell products by featuring them in stories as well as in advertisements.

High - Low

## Exercise 3

#### Find synonyms and antonyms in the text:

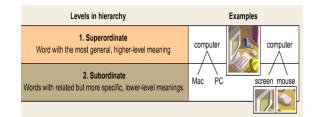
Energy is the most important resource of modern society: without power to work our machines and give us heat and light our society could not exist. Until half way through this century society was confident that the world's supply of fossilised energy would last forever. But now that proposition has been questioned and it seems that our supplies of coal, gas and oil are destined to run out. The production of nuclear energy leaves the producer with dangerous waste materials to dispose of. For these reasons mankind is investigating alternative sources of energy and of these, solar energy, energy collected from the sun, seems the most promising. This assignment will explain in detail how solar energy is collected for the generation of heat. It will examine the design and use of low temperature, medium temperature and high temperature collectors.

| SYNONYMS |        |         |            | ANTONYMS |            |              |            |      |
|----------|--------|---------|------------|----------|------------|--------------|------------|------|
|          | 1      | 2       | 3          |          | 1          | 2            | 3          | 4    |
| Words    | energy | society | production | Words    | confident  | last forever | supply     | high |
| Synon. 1 | power  | mankind | generation | Anton. 1 | questioned | run out      | dispose of | low  |

# A.4. Taxonomy

- One way to develop ideas and information in an academic text is to show hierarchical meaning relationships amongst vocabulary across the text.
- This is a more complex type of lexical cohesion than lexical chains.
- When content word meanings are similar and related but at different levels of generality, their relationship is hierarchical. In a text, words related hierarchically link more specific meanings to the most general meaning.

# A.4. Taxonomy



## Exercise 1

• Find the superordinate word amongst these related words:

syllabus, computers, teaching practice, education, tertiary level, administrative tasks, assessment, textbooks, teaching methodology, diploma, classroom, tutorial, student discipline, semester breaks, student union

Superordinate: education; all other words are subordinates

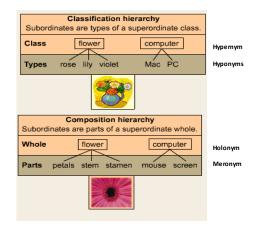
## Exercise 2

• What is the superordinate word for the following related words? cover, chapter, foreword, title, footnotes

**Answer: BOOK** 

# A.4. Taxonomy

- There are two main types of hierarchies classification and composition.
- **Classification** shows the relationship between a general class (of a thing or idea) and its members or types.
- **Composition** shows the relationship between a complete whole (of a thing or idea) and its parts or aspects.



#### A lecturer's work is never done

The work of a lecturer at tertiary institutions today is becoming much more demanding. The increase in teaching hours makes it even more difficult to manage the very different kinds of teaching they do - the mass lecture, the small group tutorial and one-to-one sessions. Their administrative load has also grown and unlike secondary school teachers, they must manage without a syllabus or textbook. Their biggest challenge however, is to continue to produce high-level scholarly research in these new circumstances.

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#### **Classification Hierarchy**

| Superordinate                       | teaching                            |
|-------------------------------------|-------------------------------------|
| Subordinates<br>3 types of teaching | lecture tutorial one-to-one-session |

| 1. Rice (Oryza sativa L.) |
|---------------------------|
| 2. Regions of the world   |
| 3. Australian (rice) crop |

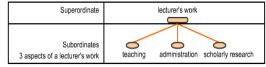
The deepest hierarchy in the text is the second one. The superordinate regions of the world has 14 subordinates. It is a composition hierarchy (temperate and tropical).

Rice (*Oryza sativa* L.) is traditionally grown in **Iropical** regions of the world, but the availability of irrigation has led to the establishment of rice growing areas in **Iemperate** regions, such as Spain, **Italy** and **California**. The rice industry in **Australia** began in the 1920s in irrigation areas along the **Murrumbidgee** and **Murray Rivers**, and these areas currently produce more than 95% of the total of about 500.000 t/year, with the remainder being produced in **Queensland** in the Burdekin Valley and the Atherton Tablelands areas (about 15,000 t/y) and the Ord River area of Western Australia (less than 2,000 t/year). While about 90% of the Australian crop is exported, the 10% consumed locally constitutes the bulk of rice available in Australia (M. Goldring, Rice-growers Co-operative Millis, Ltd., pers. commun.) Rice is available in Australia in three forms; as white or polished ... as brown or unpolished rice ... and as parbolled rice ... This paper reports on a laboratory investigation of the nutrient composition of seven brands of Australian

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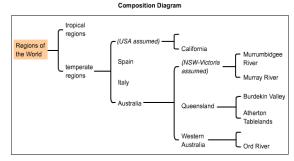
Composition Hierarchy



## Exercise 1

#### How many hierarchies can you find here?

Rice (*Oryza sativa* L.) is traditionally grown in tropical regions of the world, but the availability of irrigation has led to the establishment of rice growing areas in temperate regions, such as Spain, Italy and California. The rice industry in Australia began in the 1920s in irrigation areas along the Murrumbidge and Murray Rivers, and these areas currently produce more than 95% of the total of about 500,000 t/year, with the remainder being produced in Queensland in the Burdekin Valley and the Atherton Tablelands areas (about 15,000 t/y) and the Ord River area of Western Australia (less than 2,000 t/year). While about 90% of the Australian crop is exported, the 10% consumed locally constitutes the bulk of rice available in Australia (M. Goldring, Rice-growers Co-operative Mills, Ltd., pers. commun.) Rice is available in Australia in three forms; as white or polished ... as brown or unpolished rice ... and as parboiled rice ... This paper reports on a laboratory investigation of the nutrient composition of seven brands of Australian commercially-produced rice ...



#### Explanation

Only one region, temperate, and one country, Australia, is analysed in detail in this composition hierarchy. Also some information is missing from the paragraph. The following geographical knowledge is assumed: California is a part of the USA, and the two rivers named go across the two states of NSW and Victoria.

#### Exercise 2 Choose the best Classification diagram for Rice.

### Diagram 1 Diagram 2 Diagram 3

Rice (Oryza sativa L.)..

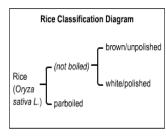


Explanation

While about 90% of the Australian crop is exported, the 10% consumed locally constitutes the bulk of rice available in Australia (M. Goldring, Rice-growers Cooperative Mills, Ltd., pers. commun.) Rice is available in Australia in three forms; as white or polished ... as brown or unpolished rice ... and as parboiled rice ... This paper reports on a laboratory investigation of the nutrient composition of seven brands of Australian commercially-produced rice (Willis R. Palipane, K. Greenfield, H. 1985 Composition of Australian foods 13 Rice)

|   | Diagram 1                   |   | Diagram 2                              | Diagram 3   |  |
|---|-----------------------------|---|--|---|--|
| ( | Rice<br>Oryza<br>sativa L.) | <ul> <li>brown</li> <li>unpolished</li> <li>white</li> <li>polished</li> <li>parboiled</li> </ul> | Rice<br>(Oryza<br>sativa L.) parboiled | $\begin{array}{c} \operatorname{Rice} \\ (Oryza} \\ sativa L.) \end{array} \left( \begin{array}{c} (not \ boiled) \\ parboiled \end{array} \right) = \begin{array}{c} \operatorname{brown/unpolished} \\ \text{white/polished} \end{array}$ |  |

## Key



| See other hierarchies in this<br>last part of paragraph |
|---|
| the paragraph.  |
| boiled) is assumed knowledge in                         |
| where one type of rice (not                             |
| This a classification hierarchy                         |

This is somewhat open to interpretation. Diagram 2 could fit in as well.

- Why is taxonomy so important in texts? - Because the process of analysis depends on it.
- Which is more important a wide vocabulary or good analysis skills?

- You need both.

- How can you ensure good vocabulary use in writing? - Analyse/taxonomise information and ideas before writing.
- What is the best way to analyse/taxonomise? - Draw diagrams. Organise your ideas/information

in diagrams before writing. Then select vocabulary.

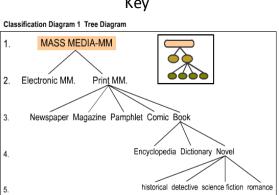
| Rice crop composition diagram | Commercial rice classification diagram  |  |  |
|-------------------------------|---|--|--|
| Australian<br>rice crop -     | Australian<br>commercially<br>produced rice<br>Brand 2<br>Brand 3<br>Brand 4<br>Brand 5<br>Brand 6<br>Brand 7 |  |  |

The rice crop is divided into 2 parts. Commerically produced rice is divided into seven types. The paragraph conclusion tells us the composition of each type will be analysed in following paragraphs.

## Exercise 3

 Make a classification diagram. What is the superordinate word?

> newspaper, mass media, detective story, electronic mass media, novel, sciencefiction, magazine, book, historicalromance, comic, pamphlet, print mass media, encyclopedia, dictionary, romance



## Key

# Connecting or overlapping taxonomies

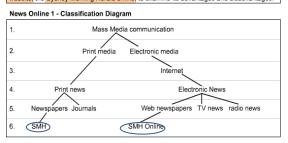
• In paragraphs and texts, there are often meaning relations between words in two or more different taxonomies. So, there are not only relations between words in one hierarchy, but also amongst words across two or more hierarchies. These overlapping hierarchies may be in one or two paragraphs and across whole texts.

# Example

In the rapidly developing field of mass media communication, print media and electronic media are no longer equally significant. With the ever increasing dominance of the internet in the world today, electronic news is taking over from print news. One of the reasons for this is the ability of the internet to give people access to web versions of all local print newspapers and journals, and at the same time link them to relevant local and global radio and TV news programmes. This essay will examine one particular local newspaper's website, the Sydney Morning Herald online, to examine its advantages and disadvantages.

#### News Online 1

In the rapidly developing field of mass media communication, print media and electronic media are no longer equally significant. With the ever increasing dominance of the internet in the world today, electronic news is taking over from print news. One of the reasons for this is the ability of the internet to give people access to web versions of all local print newspapers; and journals, and at the same time link them to relevant local and global radio and TV news programmes. This essay will examine one particular local newspaper's website, the Sydney Morning Herald online, to examine its advantages and disadvantages.



## Example 2

Daily news stories on the SMH website are typically presented as rolling text of a series of single paragraphs each beginning with a headline and ending with a 'Continue' link. If we analyse these single paragraphs and those that follow after 'Continue' we can see the global news story structure is orbital, exactly like the print news story. An orbital structure is made up of a nucleus and one or more satellites which in print newspapers typically appear together on one page. Online however, only the nucleus - the headline and first paragraph of the story - appears in the central column of the website home page. The following paragraphs of the story – satellites which elaborate the nucleus appear on later web pages. They appear with the same headline when the Continue link of each nucleus is clicked.

#### News Online 2

Daily news stories on the SMH website are typically presented as rolling text of a series of single paragraphs each beginning with a headline and ending with a 'Continue' link, if we analyse these single paragraphs and those that follow after 'Continue' link, if we analyse these single paragraphs and those that follow after 'Continue' we can see the global news story structure is orbital, exactly like the print news story. An orbital structure is made up of a nucleus and one or more satelilites which in print newspapers typically appear together on one page. Online however, only the nucleus - the headline and first paragraph of the story - appears in the central column of the website home page. The following paragraphs of the story - satelilites which elaborate the nucleus appear on later web pages. They appear with the same headline when the Continue link of each nucleus is clicked.

#### News Online 2 - Composition Tree Diagram



## B. Collocation

- Collocation is lexical cohesion which depends upon the tendency of some words to co-occur in texts.
- For example, when one sees the noun *pipe* in a sentence, it is more probable that the verb to smoke will also appear in the sentence. In another example, the noun *bicycle* could more likely occur with the verb to ride then any random verb.

# Exercise 1

In this short text, the writer has often misused the word strongly. Correct the wrong collocations using adverbs from the box. Use each adverb once only.

Everyone was complaining strongly when they heard about the new plan. People were strongly shocked to hear that children would be strongly forbidden to use the sports ground and most people were strongly opposed to the new rules. Even people who normally never expressed an opinion were strongly appalled by the proposals.

deeply utterly

strictly

bitterly



Key: complaining bitterly, deeply shocked, strictly forbidden, utterly appalled

## Exercise 2

Correct the nine collocation errors in this paragraph.

Last year I got a new job and started gaining a lot more money. I realised I could afford to use more money on my holiday than I usually do and decided to pass a month in Australia. I knew it would be hot there and so I wouldn't need to carry warm clothes with me. In fact, I used a t-shirt and jeans all the time I was there. I carried a hat all the time too, of course, to protect me from the sun. It was fantastic there. I passed a week sightseeing in Sydney and then stayed the rest of the time travelling round the country. I even did my lifelong ambition of stroking a koala.

Key: earning/making money, spend money, spend a month, take warm clothes, wore a t-shirt, wore a hat, spent a week, spent the rest of the time, achieved ambition

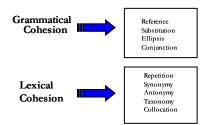
# Exercise 3

Complete the collocations in this report of a rugby match.

Cambridge were happy to (1) .... .... their last match 6:0. Oxford, the opposing team, ..... and some people thought they (3) .... put up a good (2) ..... to win. They were fearless in (4) .... their opponents, but every time they took (5) of the ball, Cambridge managed to win it back. Cambridge have now (6) ..... ... a place of the competition. They will undoubtedly come up against some in the next (7) ...... fierce (8) .... However, they have already managed to (9) .... ..... an interesting world record by having four members of the same family in their winning team!

| 1 | win        | 6 | gained  |
|---|------------|---|---|
| 2 | fight      | 7 | stage/round   |
| 3 | deserved   | 8 | competition   |
| 4 | tackling   | 9 | set (possibly beat, if there was an existing record for a team with |
| 5 | possession |   | several family members in it)                                       |

# Cohesion



## Grammatical cohesion – Reference. Ellipsis, Conjunctions

I have a dream that <u>my four little children</u> will one day live in a nation where they will not be judged by the color of their skin but Ø by the content of their character. I have a dream today!

I have a dream that one day, down in <u>Alabama</u>, with its vicious racists, with its governor having his lips dripping with the words of "interposition" and "nullification" -- one day right there in Alabama little black boys and black girls will be able to join hands with little white boys and white girls as sisters and brothers. I have a dream today!

I have a dream that one day every valley shall be exalted, and every hill and mountain shall be made low, the rough places will be made plain, and the crooked places will be made straight; "and the glory of the Lord shall be revealed and all flesh shall see it together.

(endophoric - anaphoric in all cases except for: the Lord exophoric, and I, my - exophoric)

# Consolidation exercise

#### I have a dream - Martin Luther King

I have a dream that my four little children will one day live in a nation where they will not be judged by the color of their skin but by the content of their character.

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# Lexical cohesion - Repetition

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# Antonyms

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## Taxonomy

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## Collocation

I have a dream that my four little children will one day live in a nation where they will not be judged by the color of their skin but by the content of their character.

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I have a dream today.

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