

## All structures great and small: on copular sentences with shì in Mandarin

Cheng, H.

#### Citation

Cheng, H. (2021, September 2). All structures great and small: on copular sentences with shi in Mandarin. LOT dissertation series. LOT, Amsterdam. Retrieved from https://hdl.handle.net/1887/3206651

Version: Publisher's Version

License: License agreement concerning inclusion of doctoral thesis in the

Institutional Repository of the University of Leiden

Downloaded from: <a href="https://hdl.handle.net/1887/3206651">https://hdl.handle.net/1887/3206651</a>

Note: To cite this publication please use the final published version (if applicable).

### Cover Page



### Universiteit Leiden



The handle <a href="http://hdl.handle.net/1887/3206651">http://hdl.handle.net/1887/3206651</a> holds various files of this Leiden University dissertation.

Author: Cheng, H.

Title: All structures great and small: on copular sentences with shì in Mandarin

**Issue date**: 2021-09-02

Types of Mandarin copular sentences

# 3.1 Previous research on types of copular sentences

The question as to how fine-grained a typology should be proposed for double-NP copular sentences across and within languages has long been contentious. The most fundamental distinction lies in the referentiality of the NPs flanking the copula: they can be either referential or non-referential. Higgins (1979) first proposes a four-way distinction. His influential classification is presented in (1), and (2) presents examples of different types of sentences.

			NPI	NP2
	a.	Predicational	referential	predicational
(1)	b.	Specificational	superscriptional	specificational
	c.	Identificational	referential	identificational
	d.	Identity	referential	referential

<sup>&</sup>lt;sup>1</sup>Such a dichotomy has been discussed under various labels. Keen readers are referred to Den Dikken (2017) for a more detailed review.

(2) a. Dr. Jekyll is a handsome man. Predicational
b. My best friend is Dr. Jekyll. Specificational
c. That is Dr. Jekyll. Identificational
d. Dr. Jekyll is Mr. Hyde. Identity

(Den Dikken & O'Neill 2017: 3)

Subsequent research shows a clear bipartition with respect to the way copular sentences are classified. One approach pursues an even more fine-grained typology on the basis of Higgin's four-way distinction. For instance, Declerck (1988) proposes that definitions constitute a separate category, arriving at a five-way distinction. A pyramid is what the Egyptians built to bury their pharaos in is regarded as a definition By Declerck. In contrast, the other approach tries to reduce the number of types. Crucially, the class of identificational copular sentences has been regarded as a hybrid category of specificational and identity/equative sentences (e.g. Heggie 1988; Mikkelsen 2005). Mikkelsen (2005), for instance, abstracts away from syntactic issues and arrives at a three-way typology based on the semantic types of nominal elements, following Partee (1986). Her way of classification is shown in (3).

			NPI	NP2
(3)	a.	Predicational	<e></e>	<e,t $>$
(3)	b.	Specificational	<e,t $>$	<e></e>
	c.	Identity (Equative)	<e></e>	<e></e>

Regarding the syntactic construction of copular sentences, a two-way classification has been pursued. One pivotal move since Heggie (1988) is to treat specificational sentences as having the inverse order of either predicational sentences or identity/equative sentences. It is proposed that the inverse order is derived via movement of the predicative noun phrase. Proposals that analyse specificational sentences as inverse sentences of predicational ones assume that predicational and specificational sentences are two instantiations of the same underlying subject–predicate structural relation of copular sentences (Heggie 1988; Heycock 1995; Moro 1997, 2017; Adger & Ramchand 2003; Mikkelsen 2005; Den Dikken 2006, 2017). Put differently, there may be "just one macro-type of copular sentences" (Den Dikken 2017: 11). The class of identity/equative sentences is reduced to special semantic interpretations of the two noun phrases with the same subject–predicate

structural relation. In contrast, the other group of proposals contrasts identity/equatives from predicational copular sentences from both syntactic and semantic perspectives. Specificational sentences are linked to identity/equatives instead of predicational sentences (Heycock & Kroch 1999; Rothstein 2004).

This chapter argues for a three-way taxonomy of Mandarin copular sentences (i.e. predicational, specificational, and equative) on semantic grounds and a unified underlying syntactic structure for predicational and specificational sentences. In addition, I will show that there are no true equative copular sentences in Mandarin where a single shi links the two noun phrases. Section 3.2 will first show that in Mandarin, predicational, specificational, and equative copular sentences show distinguishable semantic properties from each other. Section 3.3 will introduce the main properties of Mandarin equative sentences. Crucially, equatives in Mandarin require an adverb jiù preceding the copula shi. Section 3.4 will focus on the distinctions between predicational and specificational copular sentences. The syntactic analysis of these two types of sentences will be presented in Chapter 5, after the examination of the position of shi in Chapter 4.

## 3.2 The three-way taxonomy: From the semantic perspective

Mandarin data fit nicely into Mikkelsen's three-way typology regarding the semantic types of NPs flanking the copula. For instance, (4a), a predicational copular sentence, expresses that the entity Zhangsan has the property of being Lisi's teacher. The precopular NP is referential (of type  $\langle e, t \rangle$ ), while the postcopular NP is property-denoting (of type  $\langle e, t \rangle$ ). (4b), with an inverse order of (4a), is a specificational copular sentence, which specifies the person who bears the property of being Lisi's teacher is Zhangsan. In (4b), the non-referential property-denoting NP (of type  $\langle e, t \rangle$ ) occupies the precopular position and the referential entity-denoting NP (of type  $\langle e \rangle$ ) occupies the postcopular position. (4c) can be viewed as an equative copular sentence. It indicates that there are two individual entities (both of type  $\langle e \rangle$ ) and that they are equated. Note crucially that a focus-associated adverb such as  $ji\hat{u}$  is obligatory in an equative copular sentence. For further discussions on

 $ji\dot{u}$  and Mandarin equative sentences see Section 3.3.

(4) a. 张三是李四的老师。

Zhāngsān shì Lǐsì de lǎoshī.

Zhangsan COP Lisi SUB teacher

'Zhangsan is Lisi's teacher.'

c. 罗老师就是张三。 *Luó lǎoshī jiù shì Zhāngsān*.
Luo teacher exactly COP Zhangsan
'Teacher Luo is Zhangsan.'

### Equative

Predicational

#### 3.2.1 Reversibility

All three types of copular sentences in Mandarin are reversible in word order. Sentences in (5) respectively represent the reversed order of sentences in (4). It is clear that the reversed order of the predicational sentence (i.e. (4a)) is the same as the specificational sentence (i.e. (4b)), and vice versa. When it comes to equative sentences such as (4c) and (5c), the two orders both result in equative sentences. The adverb  $ji\hat{u}$  is obligatory in both orders, and it immediately precedes the copula.

(5) a. 李四的老师是张三。 cf. (4a)

Lǐsì de lǎoshī shì Zhāngsān.

Lisi SUB teacher COP Zhangsan

'Lisi's teacher is Zhangsan.'

b. 张三是李四的老师。 cf. (4b)

Zhāngsān shì Lǐsì de lǎoshī.

Zhangsan COP Lisi SUB teacher

'Zhangsan is Lisi's teacher.'

c. 张三就是罗老师。 cf. (4c)

Zhāngsān jiù shì Luó lǎoshī.

Zhangsan exactly COP Luo teacher
'Zhangsan is Teacher Luo.'

The reversibility between predicational and specificational copular sentences is affected by the (in)definiteness of the predicative nominals. A predicational sentence with an indefinite predicative nominal (Num-Cl-N or bare noun) does not have a corresponding inverse order because the subject in Mandarin cannot be indefinite (Chao 1968; C. N. Li & Thompson 1981; Tsai 1994, 2001; Shyu 1995; Y.-H. A. Li 1998; L. L.-S. Cheng & Sybesma 1999). For instance, the NPs cannot be flipped in either sentence in (6). (7a) is ungrammatical. (7b) per se is a grammatical sentence, but it is interpreted differently from (6b). The precopular bare noun in (7b) must be interpreted as the unique definite physics teacher in the discourse, since bare nouns in Mandarin can also be interpreted as definite (L. L.-S. Cheng & Sybesma 1999).

- (6) a. 张三是一个物理老师。

  Zhāngsān shì yī-ge wùlǐ lǎoshī.

  Zhangsan COP one-CLF physics teacher
  'Zhangsan is a physics teacher.'
  - b. 张三是物理老师。

    Zhāngsān shì wùlǐ lǎoshī.

    Zhangsan COP physics teacher
    'Zhangsan is a physics teacher.'
- (7) a. \*一个物理老师是张三。
  \* Yī-ge wùlǐ lǎoshī shì Zhāngsān.
  one-CLF physics teacher COP Zhangsan
  Intended: 'A physics teacher is Zhangsan.'
  - b. 物理老师是张三。

    Wùlǐ lǎoshī shì Zhāngsān.

    physics teacher COP Zhangsan

    'The physics teacher is Zhangsan.'

<sup>&</sup>lt;sup>2</sup>Counterexamples exist showing that an indefinite nominal can sometimes occur in the subject position in Mandarin; for examples and discussion see Tsai (1994, 2001); Y.-H. A. Li (1998). This use of Num–Cl–N structure is always closely associated with contrastive topics. Also, these apparent indefinite nominals have been argued to express a quantity interpretation rather than the standard non-quantity indefinite individual-denoting interpretation (Y.-H. A. Li 1998).

#### 3.2.2 Subject type

Although, as shown previously, the subject in predicational, specificational and equative copular sentences must all be definite, the referentiality of the subject NP differs between the three types of sentences. Mikkelsen (2005) provides a number of diagnostics showing that subjects of both predicational and equative sentences are referential, while subjects of specificational sentences are predicative. She notes that the pronominals used in tag questions, left-dislocation, and question–answer pairs differ across sentence types. Specifically, in English, predicational sentences pattern with equative sentences that pronominals in the above-mentioned contexts show phi-feature agreement with the subject, whereas specificational sentences pick up the neutral form it or the demonstrative that. Danish data show a pattern parallel to English. The English examples below present the diagnostics adopted in Mikkelsen (2005: 72-78) (cited with minor adaptation). Keen readers of Danish examples are referred to her book.

(8) a. The tallest girl in the class is Swedish. *Predicational* 

b. The tallest girl in the class is Molly. Specificational

c. [Pointing to a player on the field]
SHE is Molly Jacobson.

Equative

- (9) Tag questions
  - a. The tallest girl in the class is Swedish, isn't **she**?

Predicational

b. The tallest girl in the class is Molly, isn't it?

Specificational 5

c. [Pointing to a player on the field] SHE is Molly Jacobson, isn't **she**?

Equative

- (10) Left-dislocation
  - a. As for the tallest girl in the class, **she** is Swedish.

Predicational

b. As for the tallest girl in the class, it is Molly.

Specificational 5

c. [Pointing to a player on the field]
As for HER, **she** is Molly Jacobson.

Equative

#### (11) Question–answer pairs

a. Q: What nationality is the tallest girl in the class?

A: She/\*It/\*That is Swedish.

Predicational

- b. Q: Who is the tallest girl in the class?
  - A: \*She/It/That is Molly.

Specificational

c. Q: [Pointing to a person] Who is she?

A: She/\*It/\*That is Molly Jacobson.

Equative

These diagnostics are based on the connection between the semantic interpretation of nominals and the corresponding anaphoric pronominal forms. Specifically, it and that in English can be used as property anaphors (Mikkelsen 2005 and reference therein). (12) shows that it and that can be anaphoric to APs and VPs that are canonically taken as property-denoting elements.<sup>3</sup>

- (12) a. They said that Sheila was [beautiful] and she is **that**.
  - b. John [talks quietly]. **It/That** is a good thing to do.

(Mikkelsen 2005: 68)

When Mandarin is concerned, tag questions and question–answer pairs cannot be effective diagnostics because the occurrence of any abovementioned pronominals is rejected in Mandarin equivalents of English tag questions (e.g. (13)) and is odd in question–answer pairs (e.g. (14)).

 $<sup>^3</sup>$ Mikkelsen (2005) also points out that the use of it and that are not connected to uncertain reference or proposition denoting. First, it and that can be used even though the phi-feature of the antecedent is obvious, as shown in (i), which makes the uncertain reference account untenable. Second, if it and that are anaphoric to propositions, they should be expected to occur in all tag questions, contrary to fact. As we saw in (9), it/that is unavailable in the tag of predicational and equative sentences.

<sup>(</sup>i) The lead **actress** in that movie is Ingrid Bergman, isn't **it**? (Mikkelsen 2005: 89)

<sup>&</sup>lt;sup>4</sup>Although it is preferable that the answers in question–answer pairs such as (14) have null subjects.  $T\bar{a}$  '3sg, she' in (14a) and both  $t\bar{a}$  and  $n\dot{a}$  'that' in (14b) are not completely rejected. In any case, the use of  $n\dot{a}$  is preferable to that of  $t\bar{a}$  in (14b). Moreover, though still odd, the occurrence of  $n\dot{a}$  in (14b) is much better than in (14a). The pattern is comparable to what will be discussed in later paragraphs in regard to topicalisation and the use of anaphoric pronominals.

#### (13) Tag questions

a. 你们班最高的女生是瑞典人,(\* 她/\* 那) 不是吗?

Predicational

Nǐmen bān zuì gāo de nǚshēng shì Ruìdiǎnrén, 2PL class most tall SUB female.student COP Swedish (\* $t\bar{a}/*n\dot{a}$ ) bù shì ma? 3SG/DEM NEG SHI Q

'The tallest girl in your class is a Swedish, isn't she?'

b. 你们班最高的女生是 Molly,(\* 她/\* 那) 不是吗?

Specificational

Nǐmen bān zuì gāo de nǚshēng shì Molly, 2PL class most tall SUB female.student COP Molly (\* $t\bar{a}/*n\grave{a}$ ) bù shì ma? 3SG/DEM NEG SHI Q

'The tallest girl in your class is Molly, isn't it?'

#### (14) Question-answer pairs

a. A: 你们班最高的女生是哪国人? Predicational
Nǐmen bān zuì gāo de nǚshēng shì nǎ
2PL class most tall SUB female.student COP which
guó rén?
country people

'What is the nationality of the tallest girl in your class?'

B: (? 她/\* 那)(是) 瑞典人。 (? Tā/\*nà) (shì) Ruìdiǎnrén. 3SG/DEM COP Swedish

'She is Swedish.'

b. A: 你们班最高的女生是谁? Specificational Nǐmen bān zuì gāo de nǚshēng shì shéi? 2PL class most tall SUB female.student COP who 'Who is the tallest girl in your class?'

B: (?? 她/?? 那)(是)Molly。  $(?? T\bar{a}/?? n\hat{a}) (sh\hat{i})$  Molly. 3SG/DEM COP Swedish 'That is Molly.'

A comparable pattern in (10), namely, pronominals in relation to the left-dislocation construction, can be attested in Mandarin, although they are not as clear-cut as in English and Danish.<sup>5</sup> First, the demonstrative  $n\grave{a}$  'that' cannot be used in predicational sentences, as in (15a), while it can be used in specificational sentences, as in (15b). The predicational sentence only permits the use of  $t\bar{a}$  '3sg, she'. In addition, for reasons unclear to me,  $t\bar{a}$  in specificational sentences is acceptable to several speakers I have consulted, although the use of  $n\grave{a}$  'that' is greatly preferred.

#### (15) a. 我们班最高的女孩啊,她/\*那是瑞典人。

Predicational

Wǒmen  $b\bar{a}n$  zuì  $g\bar{a}o$  de  $n\~uh\'ai$  a,  $t\bar{a}/*n\grave{a}$  shì 1PL class most tall SUB girl TM 3SG/DEM COP  $Ru\grave{i}di\~anr\'en$ .

Swedish

'As for the tallest girl in our class, she is Swedish.'

b. 我们班最高的女孩啊,?她/那是 Molly。6

Specificational

Wŏmen  $b\bar{a}n$  zuì  $g\bar{a}o$  de  $n\check{u}h\acute{a}i$  a,  $?t\bar{a}/n\grave{a}$  shì Molly. 1PL class most tall SUB girl TM 3SG/DEM COP Molly 'As for the tallest girl in our class, that is Molly.'

(16) demonstrates that, like English,  $n\grave{a}$  'that' in Mandarin can be anaphoric to property-denoting VPs and APs. Therefore, at least the availability of  $n\grave{a}$  'that' distinguishes the type of subject in copular sentences. When  $n\grave{a}$  can be used, the subject is predicative; when  $n\grave{a}$  cannot be used, the subject is referential.<sup>7</sup>

<sup>&</sup>lt;sup>5</sup>The left-dislocation construction containing a pronominal in Mandarin has been discussed under the name "hanging topic". "Left-dislocation" has been used to refer to topicalisation with a gap (see Badan and Del Gobbo 2010 and references therein). To avoid confusion and misinterpretation (especially with the term "left-dislocation"), in the current thesis, I will use "hanging topic" to refer to left-dislocation with a resumptive pronoun or demonstrative and "postcopular nominal topicalisation" for left-dislocation with a gap.

 $<sup>^6</sup>$ I add a question mark in front of  $t\bar{a}$  'she' to show that though both  $t\bar{a}$  'she' and  $n\dot{a}$  'that' are acceptable in (15b), but there is difference in the degree of acceptability (or preference) between them.

<sup>&</sup>lt;sup>7</sup>This generalisation is in fact inadequate for the use of  $n\grave{a}$  'that'. When the subject NP is inanimate, especially when it is an abstract noun,  $n\grave{a}$  can be used. However, this generalisation in the main text holds for animate (especially human) subjects, and that is what is relevant.

- (16) a. 张三 [很用功], 那是个好习惯。

  Zhāngsān [hěn yònggōng], nà shì ge hǎo xíguàn.

  Zhangsan very diligent DEM COP CLF good habit
  'Zhangsan is diligent, and that is a good habit.'
  - b. 张三 [说话很快],**那**不是个好习惯。 *Zhāngsān* [*shuōhuà hěn kuài*],**nà** *bù shì ge hǎo*Zhangsan speak very fast DEM NEG COP CLF good *xíguàn*.

    habit

'Zhangsan speaks fast, and that is not a good habit.'

As for equative sentences,  $n\grave{a}$  'that' is not available in either order. As shown in (17), only  $t\bar{a}$  'she' can be used, indicating that the subject of a Mandarin equative sentence is referential (or not predicative). In fact, both nominals in a Mandarin equative sentence are referential.

(17) a. 我们班最高的女孩啊,她/\* 那就是 Molly。<sup>8</sup>

Wǒmen bān zuì gāo de nǚhái a, tā/\*nà jiù shì

1PL class most tall SUB girl TM 3SG/DEM exactly COP

Molly.

Molly

'As for the tallest girl in our class, she is Molly.'

b. Molly 啊,她/\* 那就是我们班最高的女孩。
Molly a,tā/\*nà jiù shì wǒmen bān zuì gāo de
Molly TM 3SG/DEM exactly COP 1PL class most tall SUB
nǚhái.
girl

'As for Molly, she is the tallest girl in our class.'

The semantic type of the subjects in the three types of copular sentences can be summarised in (18). The choice of anaphoric pronominal

<sup>&</sup>lt;sup>8</sup>Here is a scenario for use of an equative sentence.

<sup>(</sup>i) A: 听说张三喜欢班里最高的女孩。你怎么说他喜欢 Molly?

Tīngshuō Zhāngsān xihuan bānlǐ zuì gāo de nǚhái. Nǐ zěnme shuō
hearsay Zhangsan like in.class most tall SUB girl 2SG how say
tā xihuan Molly?
3SG like Molly

<sup>&#</sup>x27;I heard that Zhangsan likes the tallest girl in the class. How come do you say that he likes Molly?'

in the hanging topic construction in Mandarin displays a pattern similar to the one pointed out by Mikkelsen (2005) in English and Danish. The subjects of predicational and equative sentences are referential, of type  $\langle e \rangle$ , whereas the subjects of specificational sentences are predicative, of type  $\langle e,t \rangle$ . In fact, both nominals in equative sentences are referential, of type  $\langle e \rangle$ .

		pronominal		subject type
(18)	Predicational	$t\bar{a}$	*nà	<e></e>
	Specificational	$?t\bar{a}$	$n\grave{a}$	<e,t $>$
	Equative	$t\bar{a}$	*nà	<e></e>

Taken together, the reversibility and the subject type of each type of copular sentences in Mandarin, a three-way taxonomy from the semantic perspective can be attested in Mandarin, corresponding to Mikkelsen's classification presented in (3), repeated here as (19).

Before moving on to a discussion about Mandarin equative sentences, it is worth pointing out that (17) is grammatical with the use of  $n\hat{a}$  'that' if the specificational interpretation is yielded rather than the equative interpretation. Accordingly,  $t\bar{a}$  'she' becomes dispreferred. Such a case shows that the focus adverb  $ji\hat{u}$  can also be used in specificational copular sentences. However,  $ji\hat{u}$  in equative and specificational sentences is interpreted distinctively and pronounced with distinct prosodic features.  $Ji\hat{u}$  in equatives always bears the stress, together with  $sh\hat{i}$  and

Wốmen bān zuì  $g\bar{a}o$  de  $n\tilde{u}hái$  jiù shì Molly! 1PL class most tall SUB girl exactly COP Molly

Molly jiù shì wŏmen bān zuì gāo de nǚhái! Molly exactly COP 1PL class most tall SUB girl

B1: 我们班最高的女孩就是 Molly!

<sup>&#</sup>x27;The tallest girl in our class is Molly!'

B2: Molly 就是我们班最高的女孩!

<sup>&#</sup>x27;Molly is the tallest girl in our class!'

means 'exactly, precisely', which seems to emphasise the co-identity of the two noun phrases flanking the copula. However, jiù in specificational sentences can either bear the stress or not. When it does not bear the stress, it means 'then'. The context will involve contrastiveness. For instance, the speaker may talk about the shortest girl in the class and then turn to a statement/conversation about the tallest girl in the class. In contrast, when  $ji\hat{u}$  bears extra stress (while  $sh\hat{i}$  does not, in contrast to equatives), sometimes with a longer duration, it conveys the speaker's confidence that the statement cannot be wrong. The interaction between the prosodic properties of *jiù-shì* and the interpretations of the sentences is intricate. I leave precise acoustic analysis for future research. Note crucially that these two uses of jiù associated with specificational copular sentences can be equally carried over to predicational copular sentences and non-copular sentences. In other words, they are not restricted to specificational copular sentences. In contrast, the use of jiù in relation to equative copular sentences is particular to this specific type of sentence.

### 3.3 No true equatives in Mandarin with a bare $sh\hat{\imath}$

Although the previous section presented evidence for a three-way taxonomy of Mandarin copular sentences, this section shows that equatives differ from the other two types of copular sentences in Mandarin. Most prominently, all equatives contain the adverb  $ji\hat{u}$ , which is not required in predicational and specificational sentences. This calls into question the existence of true equative copular sentences with a bare  $sh\hat{i}$  in Mandarin.

(20) exemplifies typical equative sentences in Mandarin. They express the identity between the two entities denoted by the two nominals flanking the copula shi (more precisely, the combination of jiù-shi). For instance, (20a) indicates that the person whose name is  $Zh\bar{a}ngs\bar{a}n$  is the same person who is also known as  $Teacher\ Luo$ . (20b) indicates that their attitudes (though towards different people) are the same. Similarly, (20c) indicates that Molly is the very person that the other speaker knows as the tallest girl in the class.

#### (20) a. 张三就是罗老师。

Zhāngsān jiù shì Luó lǎoshī. Zhangsan exactly COP Luo teacher 'Zhangsan is Teacher Luo.'

b. 你对张三的态度就是我对李四的态度。

Ni dui  $Zh\bar{a}ngs\bar{a}n$  de tàidù jiù shi wo dui 2SG toward Zhangsan SUB attitude exactly COP 1SG toward Lisi de tàidù.

Lisi sub attitude

'Your attitude toward Zhangsan is my attitude toward Lisi.'

c. Molly 就是我们班最高的女孩。

Molly jiù shì wŏmen bān zuì gāo de nǚhái. Molly exactly COP 1PL class most tall SUB girl 'Molly is the tallest girl in our class.'

Heycock and Kroch (1999: 373–381) provide a few diagnostics arguing for the existence of true equative sentences in English. Unfortunately, however, Mandarin fails to provide corresponding examples for most tests. First, the authors show that true equatives are impossible in an embedded small clause, regardless of the order of the two nominals. However, Mandarin only allows for very limited cases of small clauses (see Section 2.2 in Chapter 2). Hence, in Mandarin, being able to appear in the small clause context identifies a predicational construction. However, not being able to occur in small clause contexts leads to no definitive conclusion. Second, as also pointed out in Rothstein (1995), non-restrictive modification is disallowed for predicative noun phrases, while both noun phrases in equative sentences can be modified by a non-restrictive relative clause. However, Mandarin does not exhibit formal distinctions between restrictive and non-restrictive relative clauses.

In addition to the obligatory occurrence of the adverb jiù (and the stress on both jiù and shi), a number of other properties distinguishing Mandarin equative sentences from both predicational and specificational sentences can be observed. These properties of equative sentences will be presented in the following subsections. Section 3.3.1.1 will show that the occurrence of the adverb jiù is consequential. Section 3.3.1.2 and Section 3.3.1.3 will show that both nominals flanking the combination of jiù-shi should be referential and discourse-old. Section 3.3.1.4 will show that the postcopular nominal of an equative sentence cannot be topicalised

in either order. Note that, first, jiù is not required in either predicational or specificational sentences. Second, as discussed in Section 3.2.2, in predicational and specificational sentences, one nominal constituent is referential and the other is non-referential. Third, as will be shown in Section 3.4.1, nominals in predicational and specificational sentences are not necessarily discourse-old. And last, although the postcopular nominal in a specificational sentence cannot be topicalised either, that of a predicational sentence can, which will be shown in Section 3.4.3.

#### 3.3.1 Properties of Mandarin equative sentences

#### 3.3.1.1 Obligatory use of the adverb jiù

toward Lisi.'

The adverb  $ji\hat{u}$  is obligatory in Mandarin equative copular sentences. On the one hand, some clauses will be ungrammatical if  $ji\hat{u}$  is absent. For instance, (20a) and (20b) become ungrammatical when  $ji\hat{u}$  does not occur, as in (21).

(21)\*张三是罗老师。 cf. (20a) \*Zhāngsān shì Luó lǎoshī. Zhangsan COP Luo teacher Intended: 'Zhangsan is Teacher Luo.' \*你对张三的态度是我对李四的态度。 cf. (20b) \*Nĭ duì  $Zh\bar{a}ngs\bar{a}n\ de\ tàidù$ Lĭsì shì wǒ duì 2SG toward Zhangsan SUB attitude COP 1SG toward Lisi de tàidù. SUB attitude Intended: 'Your attitude toward Zhangsan is my attitude

On the other hand, the equative readings are unavailable to other sentences although they may remain grammatical when jiù is omitted. These sentences can only be interpreted as predicational or specificational sentences, without jiù. For instance, (22) shows two equative sentences. Sentences in (23) respectively correspond to those in (22), leaving out jiù. Both sentences in (23) are grammatical, but they are no longer equatives. (23a) is a predicational sentence, while (23b) is a specificational sentence. The crucial difference between (22) and (23)

is whether both nominals will be interpreted as referential entities and as discourse-old information. This will be discussed more in detail in Sections 3.3.1.2 and 3.3.1.4.

- (23) a. Molly 是我们班最高的女孩。 Predicational Molly shì wŏmen bān zuì gāo de nǚhái. Molly COP 1PL class most tall SUB girl 'Molly is the tallest girl in our class.'
  - b. 我们班最高的女孩是 Molly。 Specificational Wŏmen bān zuì gāo de nǚhái shì Molly.

    1PL class most tall SUB girl COP Molly 'The tallest girl in our class is Molly.'

That the (non-)occurrence of  $ji\hat{u}$  leads to a different interpretation can also be observed in embedding contexts. When  $ji\hat{u}$  is absent, the sentences are interpreted predicatively even if both noun phrases are personal names, as in (24). The second nominal refers to the characteristics of the person rather than directly denoting the person. (24a) can be interpreted as 'do you think Zhangsan will behave in the same way as Lisi does', and (24b) is the reverse. In contrast, when  $ji\hat{u}$  occurs, as in (25), the sentences have the equative reading. Both sentences mean 'do you mistakenly think Zhangsan is (the same person who is also called) Lisi?' Although for such an intended meaning,  $yiw\acute{e}i$  'consider, think' is preferable to  $d\bar{a}ng$ , the interpretative pattern regarding the occurrence of  $ji\hat{u}$  is the same.

(24) a. 你当/以为张三是李四吗?

Nǐ dāng/yǐwéi Zhāngsān shì Lǐsì ma?

2SG consider Zhangsan COP Lisi Q

'Do you think Zhangsan is the same as Lisi?'

- b. 你当/以为李四是张三吗?

  Nǐ dāng/yǐwéi Lǐsì shì Zhāngsān ma?

  2SG consider Lisi COP Zhangsan Q

  'Do you think Lisi is the same as Zhangsan?'
- (25) a. 你当/以为张三就是李四吗?

  Nǐ dāng/yǐwéi Zhāngsān jiù shì Lǐsì ma?

  2SG consider Zhangsan exactly COP Lisi Q
  'Do you think Zhangsan is Lisi?'
  - b. 你当/以为李四就是张三吗?

    Nǐ dāng/yǐwéi Lǐsì jiù shì Zhāngsān ma?

    2SG consider Lisi exactly COP Zhangsan Q

    'Do you think Lisi is Zhangsan?'

#### 3.3.1.2 Both nominals are referential

As mentioned in Section 3.2.2, the choice between  $t\bar{a}$  '3sg' and  $n\hat{a}$  'that' as the anaphoric pronominal in relation to the hanging topic can be used to distinguish the type of subject in Mandarin. It was shown in (17), repeated here as (26), that  $n\hat{a}$  'that' is not available in either order of equatives. Instead, only  $t\bar{a}$  'she' can be used. Hence, both nominals are referential (of type <e>).

- (26) a. 我们班最高的女孩啊,她/\* 那就是 Molly。

  Wǒmen bān zuì gāo de nǚhái a, tā/\*nà jiù shì

  1PL class most tall SUB girl TM 3SG/DEM exactly COP

  Molly.

  Molly
  - 'As for the tallest girl in our class, she is Molly.'
  - b. Molly 啊,她/\* 那就是我们班最高的女孩。
    Molly a,tā/\*nà jiù shì wǒmen bān zuì gāo de
    Molly TM 3SG/DEM exactly COP 1PL class most tall SUB
    nǚhái.
    girl

'As for Molly, she is the tallest girl in our class.'

#### 3.3.1.3 Both nominals are discourse-old

It will be shown in Section 3.4.1 that either nominal in a predicational sentence can be the carrier of new information and that the postcopular nominal in a specificational sentence is the focus, which is seldom discourse-old. When it comes to equative sentences, however, both nominals flanking the copula must be discourse-old. In other words, both entities denoted by the nominals must be known in the discourse. The use of notions such as "topic/focus" and "discourse-new/old" follows Mikkelsen (2005) and Prince (1992). Let us have a look at (22) and (23) again. They are repeated here as (27) and (28). For instance, (27a) can be used to describe Molly's property as being the tallest girl, and (27b) can be used to identify the tallest girl in the class as Molly. The precopular nominals in both sentences can be viewed as topics, while the postcopular nominals are discourse-new. 10 However, for (28) to be felicitous, both Molly and the very girl who is the tallest in the class should be mentioned in the previous discourse. A possible context is provided in footnote 8 on page 51. For instance, the speakers may have mentioned something about Molly and something about the tallest girl in the class. The equative sentence establishes the co-identity between the two people, the relation of which is unknown (or new) to one of the speakers.

- (27) a. Molly 是我们班最高的女孩。
  Molly shì wǒmen bān zuì gāo de nǚhái.
  Molly COP 1PL class most tall SUB girl
  'Molly is the tallest girl in our class.'
  - b. 我们班最高的女孩是 Molly。

    Wǒmen bān zuì gāo de nǚhái shì Molly.

    1PL class most tall SUB girl COP Molly

    'The tallest girl in our class is Molly.'

<sup>&</sup>lt;sup>9</sup>Anikó Lipták (p.c.) suggests that the obligatory nature of  $ji\hat{u}$  in Mandarin equative sentences may be relevant for this property. As both nominals are discourse-old, the identity relation presents the new information. The focus adverb  $ji\hat{u}$  is used in relation to the information focus on the copula.

<sup>&</sup>lt;sup>10</sup>In fact, as summarised in Mikkelsen (2005: Ch.8 and Ch.9), predicational copular sentences can entertain various types of information structures, whereas the specificational copular sentences invariantly have a topic–focus structure. A similar pattern in Mandarin data will be presented in Section 3.4.1.

- (28) a. Molly 就是我们班最高的女孩。
  Molly jiù shì wŏmen bān zuì gāo de nǚhái.
  Molly exactly COP 1PL class most tall SUB girl
  'Molly is the tallest girl in our class.'
  - b. 我们班最高的女孩就是 Molly。

    Wǒmen bān zuì gāo de nǚhái jiù shì Molly.

    1PL class most tall SUB girl exactly COP Molly

    'The tallest girl in our class is Molly.'

#### 3.3.1.4 Constraints on topicalisation

As will be shown in the Section 3.4.3, extraction restrictions have been discussed extensively when different types of copular sentences are compared. However, when it comes to Mandarin, the only diagnostic in relation to the extraction restriction is the availability of topicalising the postcopular nominals. For an extensive discussion on extraction restrictions on Mandarin copular sentences, see Section 3.4.3. In short, the postcopular nominal in a predicational sentence can be topicalised, whereas that of a specificational sentence cannot; see again (29). As for equatives, the postcopular nominal cannot be topicalised in either order, as shown in (30).

- (29) a. 我们班最高的女孩,Molly 可能是。 Predicational Wǒmen bān zuì gāo de nǚhái, Molly kěnéng shì.

  1PL class most tall SUB girl Molly be.likely COP 'As for the tallest girl in our class, that is probably Molly.'
  - b. \*Molly, 我们班最高的女孩可能是。 Specificational \*Molly, wŏmen bān zuì gāo de nǚhái kěnéng shì.

    Molly 1PL class most tall SUB girl be.likely COP
- (30) a. \*我们班最高的女孩, Molly 可能就是。 Equative \*Wŏmen bān zuì gāo de nǚhái, Molly kěnéng jiù 1PL class most tall SUB girl Molly be.likely exactly shì.

  COP

b. \* Molly,我们班最高的女孩可能就是。 Equative \*Molly, wǒmen bān zuì gāo de nǚhái kěnéng jiù Molly 1PL class most tall SUB girl be.likely exactly shì.

COP

In sum, Mandarin equative sentences display a number of distinctive properties from both predicational and specificational copular sentences. First, the adverb  $ji\hat{u}$  is obligatory in addition to an obligatory  $sh\hat{\iota}$ . Both  $ji\hat{u}$  and  $sh\hat{\iota}$  must bear stress. Otherwise, the sentence is either ungrammatical or cannot have the equative interpretation. Second, both nominals flanking the copula are referential, of type <e>. Third, the entities these nominals denote must be discourse-old. In addition, unlike the inversion relation between the predicational and specificational copular sentences, equative sentences are independently reversible between the two word orders. And finally, with respect to the extraction constraints, the equative sentences are subject to the same extraction restrictions as those of specificational sentences in that the postcopular nominal cannot be topicalised.

#### 3.3.2 Two types of true equatives

Heycock and Kroch (1999) particularly mention two types of sentences that they recognise as true equative sentences in English. In fact, equivalents of both types of sentences can be found in Mandarin. Crucially, it will be shown that these sentences share with the prototypical equatives such as (20) the key properties discussed in the previous subsections.

The first type of true equative sentences Heycock and Kroch (1999) identify can be exemplified as (31a). The word-to-word translation (with the addition of  $ji\hat{u}$ ) is presented in (31b), which is a grammatical equative copular sentence.<sup>11</sup>

<sup>&</sup>lt;sup>11</sup>In Mandarin, there are better ways to express the co-identity of the two kinds of attitude, as shown in (i).

- (31) a. Your attitude toward Jones is my attitude toward Davies.
  - b. 你对张三的态度\*(就) 是我对李四的态度。
    Nǐ duì Zhāngsān de tàidù \*(jiù) shì wǒ duì
    2SG toward Zhangsan SUB attitude exactly COP 1SG toward
    Lǐsì de tàidù.

Lisi SUB attitude

'Your attitude toward Zhangsan is my attitude toward Lisi.'

The result of the hanging topic test for the subject type (see also Section 3.2.2) and postcopular nominal topicalisation (see also Sections 3.3.1.4 and 3.4.3) applied to (31b) shows a pattern similar to (26) and (30). One difference is that the demonstrative  $n\dot{a}$  'that' is acceptable here, though  $t\bar{a}$  'it' is still preferable. It is unclear whether the availability of using  $n\dot{a}$  is influenced by the semantically abstract nature of the noun phrase.

#### (32) Hanging topic test

a. 你对张三的态度啊,它/? 那就是我对李四的态度。
Nǐ duì Zhāngsān de tàidù a, tā/?nà jiù
2SG toward Zhangsan SUB attitude TM 3SG/DEM exactly
shì wǒ duì Lǐsì de tàidù.
COP 1SG toward Lisi SUB attitude
'As for your attitude toward Zhangsan it is exactly my

'As for your attitude toward Zhangsan, it is exactly my attitude toward Lisi.'

Ni duì  $Zh\bar{a}ngs\bar{a}n$  de tàidù hé wŏ duì Lisì de tàidù 2sg toward Zhangsan sub attitude and 1sg toward Lisi sub attitude  $y\bar{i}y$ àng.

same

Ni duì  $Zh\bar{a}ngs\bar{a}n$  de tàidù  $h\acute{e}$   $w\acute{o}$  duì Lisi de tàidù shì 2SG toward Zhangsan SUB attitude and 1SG toward Lisi SUB attitude SHI  $y\bar{y}y\dot{a}ng$  de.

same DE

<sup>(</sup>i) a. 你对张三的态度和我对李四的态度一样。

<sup>&#</sup>x27;Your attitude toward Zhangsan is the same as my attitude toward Lisi.'

b. 你对张三的态度和我对李四的态度是一样的。

<sup>&#</sup>x27;Your attitude toward Zhangsan is the same as my attitude toward Lisi.'

- b. 我对李四的态度啊,它/? 那就是你对张三的态度。
  Wǒ duì Lǐsì de tàidù a, tā/?nà jiù shì nǐ
  1SG toward Lisi SUB attitude TM 3SG/DEM exactly COP 2SG
  duì Zhāngsān de tàidù.
  toward Zhangsan SUB attitude
  'As for my attitude toward Lisi, it is exactly your attitude toward Zhangsan.'
- (33) Postcopular nominal topicalisation
  - a. \*我对李四的态度啊,你对张三的态度可能就是。 \*Wǒ duì Lǐsì de tàidù a, nǐ duì Z
    - 'Wǒ duì Lǐsì de tàidù a, nǐ duì Zhāngsān 1SG toward Lisi SUB attitude TM 2SG toward Zhangsan de tàidù kěnéng jiù shì. SUB attitude be.likely exactly COP
  - b. \* 你对张三的态度啊, 我对李四的态度可能就是。
    - \*Nǐ duì Zhāngsān de tàidù a, wǒ duì Lǐsì
      2SG toward Zhangsan SUB attitude TM 1SG toward Lisi
      de tàidù kěnéng jiù shì.
      SUB attitude be.likely exactly COP

The second type of true equative sentences that Heycock and Kroch (1999) distinguish is the tautology. This type involves the appearance of identical adjectives on both sides of the copula. The existence of this type of sentence is taken as another crucial argument for the existence of true equative sentences in English. Heycock and Kroch (1999) argue that these sentences pose a problem for a predicative analysis regarding type ambiguity. Assuming the existence of true equative sentences permits the analysis that the two adjectives are of the same type, namely  $\langle e,t \rangle$ . Otherwise, only one adjective can be of their normal type  $\langle e,t \rangle$ , while the other must be of the higher type:  $\langle e,t \rangle$ , As tautologies such as (34) indeed assert that the honest/dishonest property is identical to itself, approaches involving different types for adjectives in one sentence are problematic.

- (34) a. When it comes down to it, honest is honest.
  - b. You can dress it up if you like, but in the end being dishonest is just being dishonest.

(Heycock & Kroch 1999: 375)

Counterparts of the English tautologies can be found in Mandarin too, with  $ji\hat{u}$  occurring, such as the one in (35).

- (35) 你可以伪装自己,但是不诚实 \*(就) 是不诚实。
  Nǐ kěyǐ wěizhuāng zìjǐ, dànshì bù chéngshí \*(jiù) shì bù
  2SG may disguise self but NEG honest exactly COP NEG
  chéngshí.
  honest
  - 'You can have your camouflage, but dishonest is dishonest.'
- (36) 张三 \*(就) 是张三, 无恶不作。

  Zhāngsān \*(jiù) shì Zhāngsān, wú'èbúzuò.

  Zhangsan exactly COP Zhangsan unscrupulous

  '(After all), Zhangsan is Zhangsan, who is unscrupulous.'

Application of the hanging topic test and postcopular element topicalisation of the above tautologies results in a pattern similar to the above-mentioned equative sentences. First, as shown in (37), using a pronoun is preferable to the demonstrative. When the nominal is animate, use of the demonstrative  $n\dot{a}$  is rejected, as shown in (37b). When the nominal is inanimate, as in (37a), the pronoun  $t\bar{a}$  'it/he' and the demonstrative  $n\dot{a}$  'that' are both available for hanging topics. Again, the availability of using  $n\dot{a}$  may be influenced by the semantic abstractness of the noun phrase. Second, topicalisation of postcopular elements is impossible, as shown in (38). Moreover, such topicalisation does not lead to ungrammaticality of the sentences; they are completely unparsable for native speakers.

#### (37) Hanging topic test

- a. 不诚实啊,它/那就是不诚实。

  Bù chéngshí a, tā/nà jiù shì bù chéngshí.

  NEG honest TM 3SG/DEM exactly COP NEG honest
  'As for dishonest, it is dishonest.'
- b. 张三啊,他/\* 那就是张三。 *Zhāngsān a*, *tā/\*nà jiù shì Zhāngsān*.
  Zhangsan TM 3SG/DEM exactly COP Zhangsan 'As for Zhangsan, he is Zhangsan.'

#### (38) Postcopular nominal topicalisation

- a. \*不诚实啊,不诚实可能就是。
  - \*Bù chéngshí a, bù chéngshí kěnéng jiù shì. NEG honest TM NEG honest be likely exactly COP
- b. \*张三啊,张三可能就是。
  - \*Zhāngsān a, Zhāngsān kěnéng jiù shì. Zhangsan TM Zhangsan be.likely exactly COP

In short, counterparts of the two special equative sentences Heycock and Kroch (1999) identify can also be found in Mandarin. They do not show special properties distinguishing them from the prototypical equatives in (20) with regard to referentiality of the nominals and the availability of topicalising the postcopular nominal. Crucially,  $ji\hat{u}$  is also obligatory in these two cases.

Taking into consideration the requirement of jiù in the equative sentences – the most prototypical ones or the two special cases distinguished by Heycock and Kroch (1999) – this section shows that Mandarin does not have equative copular sentences with a bare shì. In addition, equative sentences containing the combination of jiù-shì display a number of distinctive properties from predicational and specificational copular sentences. Hence, they need to be analysed differently.

## 3.4 The two-way taxonomy: Canonical and inverse

Given that predicational, specificational, and equative are terms defined by the semantic properties of copular sentences, when the structure is discussed, I will employ the terms "canonical" and "inverse", following the terminology in Heycock (1995), Moro (1997), and Den Dikken (2006), among others. For languages in which the subject precedes the object, including English and Mandarin, canonical sentences can be characterised as those in which the pre-copular nominal is referential, while the postcopular nominal is predicative. Accordingly, in inverse sentences, the pre-copular nominal is predicative (or "attributive", see Heycock 1995), while the postcopular nominal is referential. For instance, (39a) represents a canonical copular sentence, while (39b) represents an inverse sentence.

(39) a. 迈克是小十一的好朋友。

Màike shì xiǎoShíyī de hǎo péngyou.

Mike COP little.Eleven SUB good friend

'Mike is a good friend of El.'

Inverse

Canonical

b. 小十一的好朋友是迈克。

XiǎoShíyī de hǎo péngyou shì Màike.
little.Eleven SUB good friend COP Mike
'The good friend of El is Mike.'

Roughly speaking, canonical sentences correspond to predicational copular sentences, while inverse sentences correspond to specificational copular sentences. <sup>12</sup> However, the use of *canonical* and *inverse* explicitly exhibits the core conception of the structural analysis this thesis argues for. For one thing, this pair of terms reflects the fundamental assumption of the current analysis that all Mandarin copular sentences have a uniform underlying structure. Particularly, the predicational order is viewed as the canonical order of the two NPs. Furthermore, it is proposed that inverse sentences are derived via the crucial step of "predicate inversion" (Moro 1997, 2017; Mikkelsen 2005; Den Dikken 2006, 2017). In other words, specificational copular sentences are analysed as copular sentences with predicate inversion. The structural analysis will be presented in Chapter 5. The remainder of this section will examine the distinctions between canonical and inverse sentences/orders with respect to semantic interpretations and syntactic behaviours.

#### 3.4.1 The pattern of focus

The first distinction between canonical and inverse copular sentences lies in the pattern of focus. As observed in many other languages, either position of a canonical copular sentence in Mandarin can be in focus. In contrast, in an inverse copular sentence, it is the postcopular element that must be in focus. Assuming that the answer to the wh-element

<sup>&</sup>lt;sup>12</sup>Den Dikken (2006: 263) in particular points out the distinction between the terms "inverse" and "reverse". According to him, the predicate occupies a higher position than the subject in both reverse predication and inverse predication structures. The inverse predication structure is derived via A-movement of the predicate. In contrast, the predicative nominal in a reverse predication structure is base-generated in a high position. A typical example for the reverse predication structure is *Brian is clever for a five-year-old*.

is the focus of the sentence, the pattern of question—answer pairs in different discourses indicates the pattern of focus of both types of copular sentences (Heycock 1995). The answers in (40) are both canonical sentences, and those in (41) are inverse sentences. As shown in (40), the noun phrases on either side of the copula in canonical sentences can bear focus, since both answers are felicitous for as responses to the questions. In contrast, the distinction in felicity between the two answers in (41) indicates that in inverse sentences only the postcopular element can be in focus. The phrases in focus are presented in bold.

- (40) Answering with canonical sentences
  - a. A: Was the culprit John or Bill?
    - B: **John** was the culprit.
  - b. A: Was John the culprit or the victim?
    - B: John was the **culprit**.
- (41) Answering with inverse sentences
  - a. A: Was the culprit John or Bill?
    - B: The culprit was **John**.
  - b. A: Was John the culprit or the victim?
    - B: # The culprit was John.

(Heycock 1995: 224)

The equivalents of (40) and (41) in Mandarin are presented as (42) and (43), respectively. Mandarin data parallel what Heycock (1995) notices in English.<sup>13</sup>

<sup>&</sup>lt;sup>13</sup> Note that alternative questions are actually blocked in the precopular position except when they are echo questions.

<sup>(</sup>i) a. \*/?? 张三还是李四是你的老师?
\*/?? Zhāngsān háishì Lǐsì shì nǐ de lǎoshī?
Zhangsan or Lisi COP 2SG SUB teacher
Intended: 'Is Zhangsan or Lisi your teacher?'

b. \* 你的老师还是你的学生是张三?

<sup>\*</sup>Nǐ de lǎoshī háishì nǐ de xuéshēng shì Zhāngsān? 2SG SUB teacher or 2SG SUB student COP Zhangsan Intended: 'Is Zhangsan your teacher or student?'

In contrast, alternative questions about the subjects are acceptable for non-copular sentences.

#### Answering with canonical sentences

a. A: 犯人是张三还是李四?

Fànrén shì Zhāngsān háishì Lǐsì? culprit COP Zhangsan or

'Was the culprit Zhangsan or Lisi?'

B: 张三是犯人。

Zhāngsān shì fànrén. Zhangsan COP culprit 'Zhangsan was the culprit.'

b. A: 张三是犯人还是受害者?

Zhāngsān shì fànrén háishì shòuhàizhě? Zhangsan cop culprit or victim 'Was Zhangsan the culprit or the victim?'

B: 张三是**犯人**。

 $Zh\bar{a}nqs\bar{a}n \ shì \ \mathbf{fanr\acute{e}n}.$ Zhangsan COP culprit 'Zhangsan was the culprit.'

#### (43)Answering with inverse sentences

a. A: 犯人是张三还是李四?

Fànrén shì Zhāngsān háishì Lǐsì? culprit COP Zhangsan or

'Was the culprit Zhangsan or Lisi?'

B: 犯人是张三。

Fànrén shì Zhāngsān. culprit COP Zhangsan 'The culprit was Zhangsan.'

b. A: 张三是犯人还是受害者?

Zhāngsān shì fànrén háishì shòuhàizhě? Zhangsan COP culprit or victim 'Was Zhangsan the culprit or the victim?'

张三还是李四要去北京? Zhāngsān háishì Lisì yào qù Běijīng?

Zhangsan or Lisi will go Beijing 'Will Zhangsan or Lisi go to Beijing?'

B: # **犯人**是张三。
#**Fànrén** shì Zhāngsān.
culprit COP Zhangsan
'The **culprit** was Zhangsan.'

Similarly, Halliday (1967, cited from Mikkelsen 2005: 133) also notes the different patterns of focus between predicational and specificational sentences. The reasoning is the same as in Heycock (1995). As shown in (44a), when John is the focus, either a predicational sentence or a specificational sentence can be used as the answer to the question. In contrast, when  $the\ winner$  is the focus, only the predicational sentence qualifies as an answer to the question because A3 violates the focus pattern of a standard specificational sentence.

(44) a. Q: Who is the winner?

A1: **John** is the winner. Predicational A2: The winner is **John**. Specificational

b. Q: What is John?

A3: # The winner is John. Specificational A4: John is the winner. Predicational

However, Halliday's test cannot be applied to Mandarin simply because the equivalents of the question in (44b) are ungrammatical, as shown in (45).<sup>14</sup> When the nominals denote human beings, the corresponding wh-element can only be  $sh\acute{e}i$  'who'. Note that as Mandarin is a wh-in-situ language, the equivalent of the question in (44b) has two variants, which correspond to a predicational sentence (45a) and a specificational sentence (45b), respectively.

<sup>&</sup>lt;sup>14</sup>Heggie (1988) argues for the semantic distinction of postcopular nominals of predicational and specificational copular sentences on the basis of the contrast between the use of 'what' and 'who', following Higgins (1973, cited from Heggie 1988). Specifically, the answer to 'what' only refers to a property in relation to a person, whereas the answer to 'who' can refer to a person. The contrast can be seen in (i) and (ii). This test cannot be carried over to Mandarin for the same reason that Halliday's (1967) test cannot be applied to Mandarin data, that is, (45) is entirely unacceptable.

<sup>(</sup>i) a. A: What is John?

B: John is the concert pianist I told you about.

(45) a. \*约翰是什么?

\*Yuēhàn shì shénme?

John COP what

Intended: 'What is John?'

Predicational

b. \*什么是约翰? \**Shánma shì* 

Specificational

\*Shénme shì Yuēhàn? what COP John Intended: 'What is John?'

The above pattern presented in (42) and (43) does not present the whole picture of the Mandarin data. In fact, in Mandarin the precopular nominal in an inverse sentence can have information focus, functioning as the carrier of new information (following E.Kiss's 1998 definition of foci). For instance, B1 is a specificational sentence. The precopular nominal Lisì de làoshī 'Lisi's teacher' in B1 in (46) has information focus, since it provides the answer to the question. Note that the word order pattern of question-answer pairs is more complex in Mandarin than what we have seen in English (cf. (i) and (ii) on page 67) when the question sentence involves a wh-constituent. Since Mandarin is a whin-situ language, the wh-constituent can occur on the either side of the copula. (46) and (47) show that when the wh-constituent in the question occupies the precopular position, the answer allows for both canonical and inverse orders. In contrast, as shown in (48) and (49), when the whconstituent occupies the postcopular position, the constituent answering the question must occur in the postcopular position regardless of the type of copular sentence.

b. A: What is the concert pianist I told you about?

B1: # The concert pianist I told you about is John.

B2: The concert pianist I told you about is French. (Heggie 1988: 74)

<sup>(</sup>ii) a. A: Who is my teacher?

B1: John is your teacher.

B2: Your teacher is John.

b. A: Who is John?

B1: \*Your teacher is John.

B2: That man over there is John.

(46) A: 谁是张三? 15

Specificational

 $\begin{array}{ll} \textit{Sh\'ei sh\`a} & \textit{Zh\bar{a}ngs\bar{a}n?} \\ \textit{who COP Zhangsan} \end{array}$ 

'Who is Zhangsan?'

B1: 李四的老师是张三。

Specificational

Lisì de laosh $\bar{l}$  shì Zhangsan. Lisi sub teacher cop Zhangsan

'Lisi's teacher is Zhangsan.'

B2:?张三是李四的老师。

Predicational

? Zhāngsān shì Lǐsì de lǎoshī. Zhangsan COP Lisi SUB teacher

(47) A: 谁是李四的老师?

Predicational

Shéi shì Lisi de làoshī? who cop Lisi sub teacher

'Zhangsan is Lisi's teacher.'

'Who is Lisi's teacher?'

B1: 张三是李四的老师。

Predicational

Zhāngsān shì Lisi de lǎoshī. Zhangsan COP Lisi SUB teacher 'Zhangsan is Lisi's teacher.'

 $N\check{a}$   $y\bar{\imath}$ -ge  $sh\grave{\imath}$   $Zh\bar{a}ngs\bar{a}n?$  which one-CLF COP Zhangsan

'Which one/person is Zhangsan?'

B1: 李四的老师是张三。

Lisi sub teacher cop Zhangsan.

'Lisi's teacher is Zhangsan.'

B2: ? 张三是李四的老师。

? Zhāngsān shì Lisi de lǎoshī. Zhangsan COP Lisi SUB teacher

'Zhangsan is Lisi's teacher.'

<sup>&</sup>lt;sup>15</sup>In fact, use of a D-linked wh-expression is preferable:

<sup>(</sup>i) A: 哪一个是张三?

B2: 李四的老师是张三。

Specificational

Lisi de lǎoshī shì Zhāngsān. Lisi sub teacher cop Zhangsan 'Lisi's teacher is Zhangsan.'

(48) A: 张三是谁?

Predicational

Zhāngsān shì shéi? Zhangsan cop who

'Who is Zhangsan?'

B1: 张三是李四的老师。

Predicational

Zhāngsān shì Lǐsì de lǎoshī. Zhangsan COP Lisi SUB teacher

'Zhangsan is Lisi's teacher.'

B2: \* 李四的老师是张三。

Specificational

\*Lĭsì de lǎoshī shì Zhāngsān. Lisi Sub teacher COP Zhangsan 'Lisi's teacher is Zhangsan.'

(49) A: 李四的老师是谁?

Specificational

 $Lisi\ de\ liosh\bar{\imath}\ shi\ shéi?$  Lisi sub teacher cop who

'Who is Lisi's teacher?'

B1: 李四的老师是张三。

Specificational

Lisi de liosh $\bar{l}$  shi  $Zh\bar{a}ngs\bar{a}n$ . Lisi sub teacher cop Zhangsan

'Lisi's teacher is Zhangsan.'

B2: \* 张三是李四的老师。

Predicational

\*Zhāngsān shì Lǐsì de lǎoshī.

Zhangsan COP Lisi SUB teacher

'Zhangsan is Lisi's teacher.'

The pattern in terms of the felicitous types of answers to each question type exemplified by (46) to (49) is summarised in Table 3.1. The corresponding distribution of topic and focus is presented in Table 3.2. In short, predicational sentences and specificational sentences present a parallel pattern. The availability of the word orders of the answers is also influenced by the position of the wh-constituent in the question in addition to the information structure.

Question Precopular wh-Postcopular wh-Answer Canonical Inverse Canonical Inverse ++Canonical e.g. 46B2 e.g. 49B2 e.g. 47B1 e.g. 48B1 + +Inverse e.g. 47B2e.g. 48B2 e.g. 49B1 e.g. 46B1

Table 3.1: Types of question—answer pairs (with wh-questions)

+: felicitous; -: infelicitous; ?: marked

Table 3.2	: Top-Foc	distribution
-----------	-----------	--------------

Question		Answer	Precopular NP	Postcopular NP
Canonical	Precopular wh-	Canonical (e.g. 47B1)	Focus	
		Inverse (e.g. 47B2)	Topic	Focus
	Postcopular wh-	Canonical (e.g. 48B1)	Topic	Focus
		Inverse (e.g. 48B2)	-	-
Inverse	Precopular wh-	Canonical (e.g. 46B2)	?Topic	?Focus
		Inverse (e.g. 46B1)	Focus	
	Postcopular wh-	Canonical (e.g. 49B2)	-	-
		Inverse (e.g. 49B1)	Topic	Focus

-: infelicitous answer; ?: marked answer

Similarly to what has been observed in English (Declerck 1988), Mandarin inverse sentences also differ from canonical sentences in that they always lead to an "exhaustiveness understanding". For instance, (50a) is neutral as to whether El has only one good friend or that she has more friends. On the other hand, (50b) implies that Mike is the only good friend El has.

- (50) a. 迈克是小十一的好朋友。

  Màike shì xiǎoShíyī de hǎo péngyou.

  Mike COP little.Eleven SUB good friend

  'Mike is a good friend of El.'
  - b. 小十一的好朋友是迈克。

    XiǎoShíyī de hǎo péngyou shì Màike.
    little.Eleven SUB good friend COP Mike
    'The good friend of El is Mike.'

This shows that in inverse sentences, the postcopular noun phrase is interpreted exhaustively. The exhaustive interpretation of the postcopular phrase can further be illustrated with examples in which an inverse copular clause is followed by coordinated material that contains a similar postcopular noun phrase. Coordination with its inverse counterpart (i.e. (50b)) is not permitted; (51b) is unacceptable, as opposed to (51a).

- (51) a. 迈克是小十一的好朋友, 也是威尔的好朋友。

  Màike shì xiǎoShíyī de hǎo péngyou, yě shì Wēi'ěr

  Mike COP little.Eleven SUB good friend also COP Will

  de hǎo péngyou.

  SUB good friend

  'Mike is a good friend of El, and he is also a good friend of
  - b. \*小十一的好朋友是迈克, 也是威尔。

    \*XiǎoShíyī de hǎo péngyou shì Màike, yě shì
    little.Eleven SUB good friend COP Mike also COP

    Wēi'ěr.

    Will

The exhaustive reading of the postcopular phrase in inverse structures can be attributed to the definiteness of then precopular noun phrase. Recall that it has been shown in Section 3.2.1 that although there are a few exceptions, subjects in Mandarin sentences are definite. The definiteness of the subject nominal presupposes the uniqueness of the entity in the discourse. In other words, as indicated in the translation line, the subject nominal phrase  $xi\check{a}oSh\acute{i}y\bar{i}$  de  $h\check{a}o$   $p\acute{e}ngyou$  'El's good friend' presupposes that there is only one good friend of El in the context. This means that the postcopular noun phrase, identifying the precopular noun phrases' identity is necessarily interpreted exhaustively. Conversely, as the postcopular predicative nominals can only be indefinite (see footnote 2 on page 16), no uniqueness is presupposed for the postcopular nominal in canonical sentences such as (50a). Hence, no exhaustive interpretation is presupposed.

Declerck (1988) also notes the contrast between definite NP subjects and indefinite NP subjects. Compare the sentences in (52). (52a) implies that there are more than one example whereas (52b) indicates that World War II is the only example linked to the discourse. <sup>17</sup>

 $<sup>^{16}\</sup>mathrm{I}$  thank Jenny Doetjes and Caroline Heycock for pointing out this possibility to me.

 $<sup>^{17}</sup>$ Declerck argues that the connection between a definite NP subject and the

- (52) a. An example of this is World War II.
  - b. The example of this is World War II.

(Declerck 1988: 19-20)

A parallel pattern can be observed in Mandarin. The equivalent of sentences in (52) are presented in (53). The precopular nominal in (53a) is indefinite while that in (53b) is definite. (53a) implies that there are other example(s) other than World War II whereas (53b) implies that World War II is the only example in the context. Again, as shown in (54), additional material can be added to (53a) but not (53b).

- (53) a. 这样的一个例子是二次大战。 cf. (52a)

  Zhèyàng de yī-ge lizi shì èrcìdàzhàn.

  such SUB one-CLF example COP World.War.II

  'An example of this is World War II.'
  - b. 这样的例子是二次大战。 cf. (52b)

    Zhèyàng de lìzi shì èrcìdàzhàn.

    such SUB example COP World.War.II

    'The example of this is World War II.'
- (54) a. 这样的一个例子是二次大战,还有一个是一次大战。

  Zhèyàng de yī-ge lìzi shì èrcìdàzhàn, háiyǒu such SUB one-CLF example COP World.War.II also
  yī-ge shì yīcìdàzhàn.
  one-CLF COP World.War.I
  'An example of this is World War II, and another example is World War I.'
  - b. \*这样的例子是二次大战,也是一次大战。

    \*Zhèyàng de lìzi shì èrcìdàzhàn, yě shì
    such SUB example COP World.War.II also COP
    yīcìdàzhàn.

World.War.I Intended: 'An example of this is World War II, and another

example is World War I.'

.

exhaustivity is an implicature, rather than presupposition or entailment. The exhaustiveness understanding can be derived by Cooperative Principle. A cooperative speaker will give the full list of values that satisfy the variable when using a specificational sentence. Keen readers are referred to Declerck (1988) for details.

The current thesis will not delve into the exact source of exhaustiveness associated with specificational copular sentences in Mandarin and other languages. What is crucial here is that inverse sentences have a pattern of focus distinct from that of canonical sentences. In a canonical sentence, both nominals can be in focus. In contrast, in an inverse sentence, only the postcopular nominal can be in focus. Crucially, the postcopular nominal in an inverse sentence is always in focus.

#### 3.4.2 Obligatoriness of shì

As introduced in Section 2.2 in Chapter 2, while predicational copular sentences enjoy limited freedom in the optionality of copula shi, specificational copular sentences never allows for the omission of shi. Here are more examples showing the contrast between the two types of sentences regarding the occurrence of shi. The most crucial context is small clauses under verbs such as 'consider'. The English examples are presented below.

- a. I consider [[Susan] [my best friend]].b. \*I consider [[my best friend] [Susan]].
- (56) I consider [my best friend to be Susan].

Mandarin exhibits the same pattern, although the use of small clauses is indeed limited. It is worth pointing out that Mandarin probably has two different words corresponding to 'consider'. One always requires an overt copula  $sh\hat{\imath}$ , while the other allows for a small clause without the copula. The complement clause of the verb  $r\hat{e}nw\hat{e}i$  'consider, think' ought not to be taken as a small clause, but rather as a finite clause. As shown in (57), when  $r\hat{e}nw\hat{e}i$  'consider' is the matrix verb,  $sh\hat{\imath}$  is obligatory in the embedding clauses for both word orders.<sup>18</sup>

(57) a. 我认为苏珊 \*(是) 我最好的朋友。

Wǒ rènwéi Sūshān \*(shì) wǒ zuì hǎo de péngyou.

1SG consider Susan COP 1SG most good SUB friend
'I consider Susan my best friend.'

b. 我认为我最好的朋友\*(是) 苏珊。

Wǒ rènwéi wǒ zuì hǎo de péngyou\*(shì) Sūshān.

1SG consider 1SG most good SUB friend COP Susan

In contrast,  $sh\hat{\imath}$  can be optional in canonical clauses (but not in inverse clauses) when  $d\bar{a}ng$  'consider' is the matrix verb. (58a) presents the example where  $sh\hat{\imath}$  can be omitted under  $d\bar{a}ng$ . The reversed order between  $Zh\bar{a}ngs\bar{a}n$  and  $sh\check{a}zi$  'idiot' requires an overt  $sh\hat{\imath}$ , as in (58b). Admittedly, although a sentence like (58b) may sound a bit odd or even marginal to many speakers, it will become completely ungrammatical if  $sh\hat{\imath}$  is absent.

'I consider my best friend to be Susan.'

 $^{18}$  Major evidence comes from the locality constraint of object preposing to the internal topic position in Mandarin (Shyu 1995, 2001; Paul 2002; Kuo 2009). It has been argued that the internal topic position that is the landing site of the proposed object is an A-position. The contrast between (ib) and (iib) shows that the complement of  $\dot{renw}\acute{e}i$  'consider' is a finite clause, whereas that of  $b\bar{\iota}$  'force' is not, considering that the A-movement is clause-bound.

(i) a. 我认为张三偷走了那个面包。

Wǒ rènwéi Zhāngsān tōu-zǒu le nà-ge miànbāo
1sg consider Zhangsan steal-away PFV DEM-CLF bread
'I thought Zhangsan stole that piece of bread.'

(ii) a. 我逼张三偷走了那个面包。
 Wǒ bī Zhāngsān tōu-zǒu le nà-ge miànbāo.
 1SG force Zhangsan steal-away PFV DEM-CLF bread
 'I forced Zhangsan to steal that piece of bread.'

 $^{19}\mathrm{Note}$  that  $sh\check{a}zi$  'idiot' in (58b) must have a definite reading, that is, 'the idiot' identified in the discourse.

- (58) a. 你当张三 (是) 傻子吗? (=(24a) in Chapter 2)

  Nǐ dāng Zhāngsān (shì) shǎzi ma?

  2SG consider Zhangsan COP idiot Q

  'Do you consider Zhangsan an idiot?'
  - b. 你当傻子\*(是) 张三吗?

    Nǐ dāng shǎzi\*(shì) Zhāngsān ma?

    2SG consider idiot COP Zhangsan Q

    'Do you consider the idiot to be Zhangsan?'

In certain contexts, shi can also be optional in matrix clauses. However, this is only the case in canonical sentences. First, most of the nominal predicate examples in (21) in Chapter 2 (on page 27) disallow an inverse order because the initial nominal of a sentence must be definite. Only (21c) is reversible, but an overt shi is obligatory in its inverse counterpart, as shown in (59).

- (59) a. 今天 (是) 星期日。 (=(21c) in Chapter 2)

  Jīntiān (shi) Xīngqīrì.

  today COP Sunday

  'Today is Sunday.'
  - b. 星期日\*(是)今天。 Xīngqīrì\*(shì) jīntiān. Sunday COP today 'Sunday is today.'

In addition, as shown in Chapter 2, unlike non-copular sentences, gapping can be found in Mandarin copular sentences when a pair-list context is constructed. However, in the same contexts, shi cannot gap if the word order is reversed, as shown in (60).

- - b. 数学老师\*(是) 张三,物理老师\*(是) 李四,化学老师\*(是) 赵六。

    Shùxué lǎoshī \*(shì) Zhāngsān, wùlǐ lǎoshī \*(shì) Lǐsì,
    maths teacher COP Zhangsan physics teacher COP Lisi
    huàxué lǎoshī \*(shì) Zhàoliù.
    chemistry teacher COP Zhaoliu
    'The maths teacher is Zhangsan, the physics teacher is Lisi,
    and the chemistry teacher is Zhaoliu.'

In sum, canonical sentences allow for the absence of shi in some contexts, such as small clauses under verbs like 'consider', nominal predicate constructions, and gapping. In contrast, shi is always obligatory in inverse sentences.

#### 3.4.3 Extraction restrictions

Much attention has been paid in the literature to the extraction restrictions on the postcopular noun phrase in inverse sentences as compared to canonical sentences (Heycock 1995; Moro 1997; Heycock & Kroch 1999; Den Dikken 2006). It has been observed that, in English and Italian, extraction of either the entire postcopular phrase or anything out of that phrase is impossible. (61) and (62) below are examples from English. In a canonical sentence, a postcopular noun phrase, or an element thereof, can be extracted, as in (61), whereas inverse sentences do not allow extraction of either, as shown in (62).

#### (61) Canonical:

- a. Which of the themes do you think that phrase of music was?
- b. What do you think the photograph of the president may have been the cause of?

#### (62) Inverse:

- a. \*Which phrase of music do you think one of the themes was?
- b. \*What do you think the cause of the riot may have been the photograph of?

(Heycock 1995: 226)

Though robust for many languages as a test showing the differences between canonical and inverse structures, extraction can hardly be applied to Mandarin. First of all, as Mandarin is a wh-in-situ language, Mandarin counterparts of (61) and (62) cannot be formulated. Applicable A'-movement concerns topicalisation and relativisation. However, relativisation cannot be used to differentiate between the two types of structures, either. For one thing, both canonical and inverse constructions yield ungrammaticality when either nominal flanking  $sh\hat{\imath}$  is relativised, as shown in (64) and (65), as opposed to (63).

#### (63) Non-copular sentences

- a. 达斯汀唱了一首歌。

  Dásītīng chàng le yī-shǒu gē.

  Dustin sing PFV one-CLF song
  'Dustin sang a song.'
- b. [达斯汀唱 t] 的那首歌
  [Dásītīng chàng t] de nà-shǒu gē
  Dustin sing t SUB DEM-CLF song
  'that song that Dustin sang'
- c. [t 唱了一首歌] 的男孩
  [t chàng le yī-shǒu gē] de nánhái
  t sing PFV one-CLF song SUB boy
  'the boy who sang a song'

#### (64) Canonical copular sentences

a. 达斯汀是晚会主持人。

Dásītīng shì wǎnhuì zhǔchírén.

Dustin COP ball host
'Dustin is the host of the ball.'

- b. \*[达斯汀是 t] 的那个晚会主持人
  \*[Dásītīng shì t] de nà-ge wǎnhuì zhǔchírén
  Dustin COP t SUB DEM-CLF ball host
  Intended: 'that ball host who is Dustin'
- c. \*/?? [t 是晚会主持人] 的那个男孩

  \*/?? [t shì wǎnhuì zhǔchírén] de nà-ge nánhái

  t COP ball host SUB DEM-CLF boy

  Intended: 'that boy who is the ball host'
- (65) Inverse copular sentences
  - a. 晚会主持人是达斯汀。

    Wǎnhuì zhǔchírén shì Dásītīng.
    ball host COP Dustin
    'The host of the ball is Dustin.'
  - b. \*[晚会主持人是 t] 的那个男孩
    \*[wǎnhuì zhǔchírén shì t] de nà-ge nánhái
    ball host COP t SUB DEM-CLF boy
    Intended: 'that boy who is the ball host'
  - c. \* [t 是达斯汀] 的那个晚会主持人
    \*[t shì Dásītīng] de nà-ge wǎnhuì zhǔchírén
    t COP Dustin SUB DEM-CLF ball host
    Intended: 'that ball host who is Dustin'

Furthermore, relativising element inside a postcopular noun phrase cannot be used to differentiate canonical and inverse sentences, either. Although the contrast between (66b) and (67b) appears to show that extraction from the postcopular nominal is available in canonical sentences but unavailable in inverse sentences, (66b) actually contains the so-called "gapless" relative clauses for which no extraction is assumed to be involved (L. L.-S. Cheng & Sybesma 2005; N. Zhang 2008; C.-T. J. Huang, Li & Li 2009). The examples below in (66) and (67) are translations of corresponding examples in Moro (1997).

#### (66) Canonical:

a. 那个人的发言是案件的起因。

Nà-ge rén de fāyán shì ànjiàn de qǐyīn.

DEM-CLF person SUB speech COP court.case SUB cause

'That person's speech was the cause of the court case.'

b. [那个人的发言是起因] 的案件
[nà-ge rén de fāyán shì qǐyīn] de ànjiàn
DEM-CLF person SUB speech COP cause SUB court.case
'the court case whose cause was that person's speech'

#### (67) Inverse:

- a. 案件的起因是那个人的发言。 ànjiàn de qǐyīn shì nà-ge rén de fāyán. court.case SUB cause COP DEM-CLF person SUB speech 'the cause of the court case was that person's speech.'
- b. \*[案件的起因是发言] 的那个人
  \*[ànjiàn de qǐyīn shì fāyán de] nà-ge rén
  court.case SUB cause COP speech SUB DEM-CLF person
  Intended: 'the person whose speech is the cause of the
  court case'

Consequently, the only applicable diagnostic of extraction restrictions on postcopular nominals in Mandarin is topicalisation. (68a) is a canonical sentence, and (68b) is an inverse sentence. The two sentences show differences in the availability of topicalising the postcopular noun phrases. Although (69a) may be to a certain extent odd or unnatural to many speakers, (69b) is completely bad.

#### (68) a. 张三是李四昨天见到的那个人。

Zhāngsān shì Lǐsì zuótiān jiàn-dao de nà-ge Zhangsan COP Lisi yesterday see-arrive SUB DEM-CLF rén.

person

'Zhangsan is the person Lisi met yesterday.'

b. 李四昨天见到的那个人是张三。

Lǐsì zuótiān jiàn-dao de nà-ge rén shì Lisi yesterday see-arrive SUB DEM-CLF person COP  $Zh\bar{a}nqs\bar{a}n$ .

Zhangsan

'The person Lisi met yesterday was Zhangsan.'

(69) a. ?? 李四昨天见到的那个人啊,张三是。

??!Lisì zuótiān jiàn-dao de nà-ge rén a, Lisi yesterday see-arrive SUB DEM-CLF person TM Zhāngsān shì.

Zhangsan COP

'As for the person who Lisi met yesterday, Zhangsan was.'

b. \*张三啊,李四昨天见到的那个人是。

\*Zhāngsān a, Lǐsì zuótiān jiàn-dao de nà-ge Zhangsan TM Lisi yesterday see-arrive SUB DEM-CLF rén shì. person COP

For unknown reasons, the oddness of sentences like (69a) can be removed or at least greatly eliminated by adding a sentence-final particle (70a) or a modal element (71a). However, such salvaging strategies have no effect on inverse sentences, as attested by the ungrammaticality of (70b) and (71b).

(70) a. 李四昨天见到的那个人啊,张三是的(呀)。 *Lǐsì zuótiān jiàn-dao de nà-ge rén a, Zhāngsān*Lisi yesterday see-arrive SUB DEM-CLF person TM Zhangsan *shì de* (ya).

'As for the person who Lisi met yesterday, Zhangsan was.'

- b. \*张三啊,李四昨天见到的那个人是的(呀)。
  - \*Zhāngsān a, Lǐsì zuótiān jiàn-dao de nà-ge

    Zhangsan TM Lisi yesterday see-arrive SUB DEM-CLF

    rén shì de (ya).

    person COP DE SFP
- (71) a. 李四昨天见到的那个人啊,张三可能是。

Lǐsì zuótiān jiàn-dao de nà-ge rén a, Zhāngsān Lisi yesterday see-arrive SUB DEM-CLF person TM Zhangsan kěnénq shì.

be.likely COP

COP DE SFP

'As for the person who Lisi met yesterday, Zhangsan was likely to be.'

b. \* 张三啊,李四昨天见到的那个人可能是。
\* Zhāngsān a, Lǐsì zuótiān jiàn-dao de nà-ge
Zhangsan TM Lisi yesterday see-arrive SUB DEM-CLF
rén kěnéng shì.
person be.likely COP

The improvement in the acceptability/grammaticality judgement of (70a) and (71a) from (69a) indicates that the oddness of (69a) can be attributed to independent reason(s) that dislike(s) a bare *shi* stranding in sentence-final position. Crucially, the contrast between the (a) sentences and (b) sentences in (70) and (71) suggests that Mandarin allows for topicalisation of the postcopular nominal in canonical sentences while it disallows for topicalising the postcopular nominal in inverse sentences.

In short, a distinction between canonical and inverse sentences in terms of extraction restrictions can also be observed. Specifically, canonical sentences allow for topicalising the postcopular nominal, whereas inverse sentences do not. Other diagnostics in relation to extraction, including wh-questions and relativisation, cannot be effectively applied to Mandarin to differentiate the two types of copular sentences for various reasons.

#### 3.4.4 Interim summary

This section examines the relation and distinctions between Mandarin canonical and inverse copular sentences. It has been shown that inverse sentences have a number of properties opposite to those of canonical sentences. Semantically speaking, the postcopular element of an inverse sentence must be referential and be interpreted exhaustively. It is always in focus. Structurally speaking, inverse sentences always require overt use of the copula shi, while canonical sentences allow for omission of shi under certain circumstances. In addition, topicalisation of postcopular elements in inverse sentences is prohibited, while no such restriction applies for canonical sentences. Chapter 5 will argue for the single-structure approach to account for the relation between Mandarin predicational and specificational copular sentences as well as their distinctions. The distinction in the course of derivation results in the distinctions between the two types of sentences we have observed.

#### 3.5 Conclusion

This chapter discussed the taxonomy of copular sentences in Mandarin. From the semantic perspective, Mandarin displays a three-way taxonomy: predicational, specificational, and equative sentences. The semantic types of the nominals in the three types of copular sentences present a clear-cut three-way distinction, evidenced by the "hanging topic" pronominal test, shown in (72), adapted from Mikkelsen (2005).

However, as all the apparent equative sentences in Mandarin additionally require the adverb  $ji\hat{u}$ , this suggests that true equative copular sentences do not exist in Mandarin with a single  $sh\hat{\iota}$ . Specifically, a group of sentences will be ungrammatical without the occurrence of  $ji\hat{u}$ , let alone having the equative interpretation. Another group of sentences will only have the predicational or specificational interpretation if  $ji\hat{u}$  is absent. In addition, for sentences that have it, this  $ji\hat{u}$ - $sh\hat{\iota}$  is coupled with a special prosodic pattern in which both  $ji\hat{u}$  and  $sh\hat{\iota}$  must be stressed.

As far as the use of the linking element between the two nominal constituents is concerned, a clear pattern can be observed in Mandarin, shown in (73). In both matrix and embedded clauses, shi can conditionally be optional in predicational copular sentences, while it is always obligatory in specificational copular sentences. In addition to an obligatory shi, the adverb jiù is also required in equative sentences, irrespective of the word order.

(73) a. Predicational: NP1 (shì) NP2
b. Specificational: NP2 \*(shì) NP1
c. Equative: NP1/NP2 \*(jiù shì) NP2/NP1

If copular sentences in which the bare shì functions as the linking element are concerned, we arrive at a two-way taxonomy: predicational and specificational sentences. In terms of syntactic analysis, a unified underlying structure for both types of sentences will be argued for in

84 3.5. Conclusion

Chapter 5. On the basis of the unified underlying structure, predicational sentences are viewed as the canonical structure, while specificational sentences are taken to be the inverse structure; the inverse structure is derived via predicate inversion (Moro 1997; Mikkelsen 2005; Den Dikken 2006). The canonical and inverse sentences differ from each other in a number of respects. First, they show a different pattern of focus. The postcopular nominal in an inverse sentence must be in focus, and it is an identificational focus which has the exhaustive interpretation. Second, shi in canonical sentences can be omitted in a few contexts, whereas shi in inverse sentences is always obligatory. Lastly, the postcopular nominal in a canonical sentence can be topicalised whereas that of an inverse sentence cannot. All the contrast between the two types of sentences will be accounted for by the structure proposed in Chapter 5. Before moving to the structural analysis, the next chapter will first examine the distribution and nature of shi.