EVIDENTIALITY AND CHINESE MODALS

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Abstract

This dissertation explores the semantics of epistemic modality and attitude expressives through a detailed study of two pairs of modals in Mandarin Chinese, the epistemic modals *keneng*/*yiding* and attitude expressives *danyuan/kongpa*. The meaning of each of the four modals in Chinese is described on the basis of data collected by the author and from published sources.

One of the main aims of the dissertation is to investigate the felicity conditions of the modals. I argue that the epistemic modals (*keneng* and *yiding*) and the attitude expressives (*danyuan* and *kongpa*) react to *evidentiality* - the inherent encoding of information sources in a clause. I show that epistemic modals clash with firsthand evidential type. The reason is explained through an evidentiality hierarchy I propose in the dissertation. Arguing against hierarchies previously proposed in the literature, I arrange inherent evidentiality types on a scale according to the reliability of the information source. Epistemic modals encoding a high degree of certainty, rank lower than direct or firsthand information, common human knowledge, culture shared knowledge, visual testimonial and private experience. The relatively lower ranking of epistemic modals is involved to explain why they are incompatible with sentences that covertly exhibit high reliable information sources (*viz*. firsthand information). The attitude expressives *danyuan* and *kongpa* are infelicitous in sentences encoding firsthand information for similar reasons.

At a formal semantics level, I argue that previous approaches of interpreting epistemic modals (*keneng* and *yiding*) and attitude expressives (*danyuan* and *kongpa*) by means of classical possible worlds provide unsatisfactory accounts for their incompatibility with highly reliable information sources. I show that classical possible world semantics fails to supply accurate truth values for sentences in which epistemic modals (or attitude expressives) clash with highly reliable information. I adopt and develop a

fuzzy logical model, called *Fuzzy Evidentiality Language*, which not only formalizes the above evidentiality hierarchy, but also provides satisfactory semantic values for this incompatibility.

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Abbreviations and symbols

1PPL	First person plural pronoun	S_{top}	Topic scenario
1PSG	First person singular pronoun	S_{uni}	Universal scenario
2PPL	Second person plural pronoun	T	Set of times
2PSG	Second person singular pronoun	T_{top}	Topic time
3PPL	Third person plural pronoun	T_{sit}	Situation time
3PSG	Third person singular pronoun	T_{uni}	Universal time
AUD	Auditory information source	VIS	Visual testimony information
Aux	Auxiliary verb	VP	Verb phrase
CL	Classifier	W_{top}	The topic set of possible worlds
COM	Common human knowledge	W_{uni}	The universal set of possible worlds
CULT	Culturally shared knowledge	W	Set of possible worlds
DE	The possessive *de*	*	Unacceptable; disallow
EVID	Evidential	?	Problematic usages
EXP	Human experience knowledge	¬	Negative
EXPP	Experiential particle	∧	Conjunction (and)
HEAR	Hearsay information source	∨	Inclusive disjunction (or)
FUT	Future	↔	Equivalence (iff)
INF	Inferential information source	→	Material implication (if, then)
NP	Noun phrase	=	Identify operator
O	Conversational background	≈	Asymptote equal
P	Proposition	≫	More reliable than
PAR	Modal particle	≤	Is earlier than or equal to
PAST	Past	≥	Is later than or equal to
PER	Perfective particle	⊨	Is true
POSS	Possible	⊭	Is not true
Pred	Predicational frame	∀	Universal quantifier (all, every)
PREP	Preposition	∃	Existential quantifier (a/ some)
PROG	Progressive particle	◇	Possibility operator
PROP	Proposition	□	Necessity operator
QUO	Quotative information	∅	The null (or empty) set
R	Accessibility relation	∈	Set membership (is a member of)
REA	Inference information from reasoning	∩	Set intersection
RES	Inference information through results	⊆	Subinterval relation
SENT	Sentence	⊊	Included but not equal to