

Lecture 8

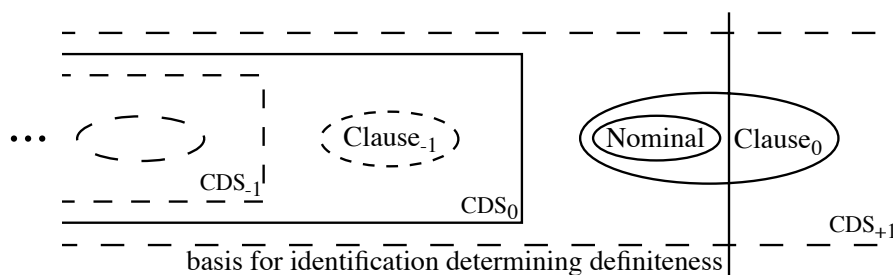
Indefiniteness and Quantification

A. Articles B. Virtual Referents C. Relative Quantifiers D. Contextually Relevant Extension

A. Articles

- (1)(a) Grounding is primarily **discursive**: it specifies a referent's *epistemic status*, which changes from moment to moment depending on the *current discourse space* (CDS).
- (b) A referent marked with the **indefinite article** *a* in one expression can take the **definite article** *the* in the next: *He was feeding **a dog** and a panda. **The dog** was really ugly.*
- (c) The article changes because the *substrate* changes, altering the referent's epistemic status.
- (d) Indefinite nominals are *grounded*, but their referent is said to be **unidentified**. However, grounding is based on *identification* (S and H focusing on the *same referent*).
- (e) The CDS is continually being **updated**. A nominal is definite or indefinite depending on whether or not the referent is identified at a *specific point* in the updating process.

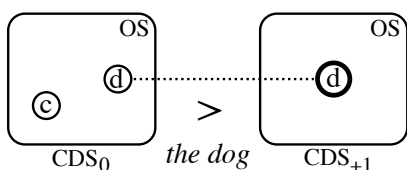
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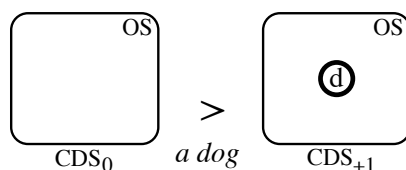
- (3)(a) Each clause updates the CDS. Clause_0 is the current target. CDS_0 is its substrate.
- (b) Due to *conceptual autonomy*, a nominal has **functional priority** within the clause containing it. The clausal process is *conceptually dependent* on its participants.
- (c) The basis for assessing **definiteness** is therefore limited to the *immediate substrate*, CDS_0 , and the content provided by the *nominal itself*.
- (d) Even if unidentified (hence indefinite) on that basis, the referent's role in the clause serves to identify it for *subsequent purposes*. It is an **established discourse referent** in CDS_{+1} .
- (e) The discourse itself is part of the **shared conceptual substrate**, so the very fact of occurring in a clause provides a nominal referent with a **place** in this substrate.

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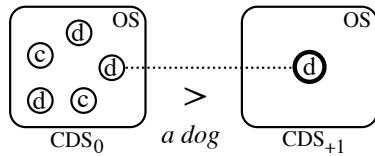
(a) *Jill was petting a dog and a cat.*] $_{\text{CDS}_0}$
 > *The dog* looked friendly.] $_{\text{CDS}_{+1}}$



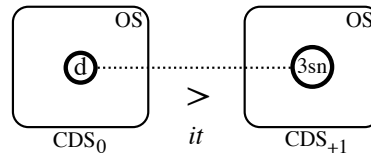
(b) *Jill looked in the pet shop.*] $_{\text{CDS}_0}$
 > *She saw a dog.*] $_{\text{CDS}_{+1}}$



(c) *I saw dogs and cats there.*]_{CDS₀}
 > *Jill was petting **a dog**.*]_{CDS₊₁}

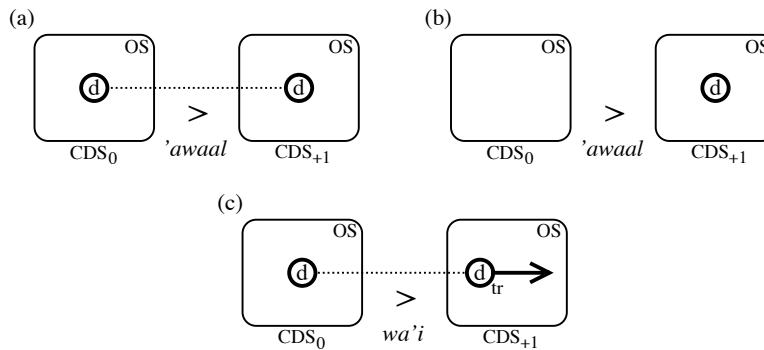


(d) *Jill was petting a dog.*]_{CDS₀}
 > ***It** looked friendly.*]_{CDS₊₁}



(5) *Noo=n 'awaal-i toow-q. Wa'i-q.* 'I see {the / a} dog. It's barking.' [Luiseño]
 I=1s dog-OBJ see-TNS bark-TNS

(6)



(7)(a) COUNT N: {the / a} lake MASS N: {the / sm} {water / lakes}

(b) *He extinguished the cigarette by pouring **sm water** in the ashtray.*

(c) *?They extinguished the campfire by pouring **sm water** on it.*

(d) **They extinguished the forest fire by dropping **sm water** on it.*

(8)(a) Mass nouns can be used without an indefinite article: *They poured **water** on the fire.*

(b) In such cases *delimitation* is inferred from the **event** the referent participates in.

(c) The referent is grounded and quantified by the clause containing it, which overrides (or **elaborates**) the **baseline conception** of reference to the *maximal extension* (ME).

(d) The result (in CDS₊₁) is a delimited, identified instance of the type. Using the noun in the context of the clause fulfills the referential function of a nominal.

(9)(a) There are a variety of grounding strategies: unique reference, overt grounding element, discourse construction, inference from containing clause.

(b) This reinforces the basic point that semantic function is more fundamental to grammar than specific structural implementation.

B. Virtual Referents

(10)(a) Some nominals said to be **non-referential**: (i) ***A tiger** has **stripes**.* (ii) ***Nobody** will ever admit that **he** is wrong.* (iii) *He is hoping to find **a new job**.* (iv) ***Any woman** wants **a diamond ring**.* (v) *If I had **a pet snake**, I would try to catch **mice** to feed **it**.*

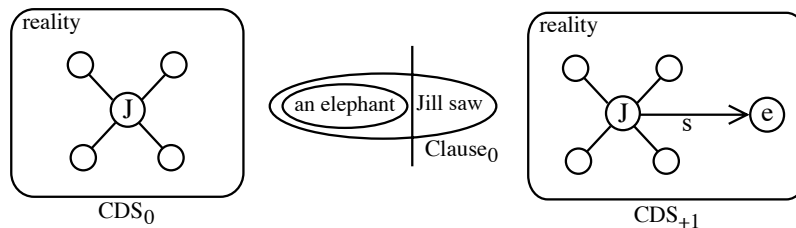
(b) A definition of **referent** limited to actual real-world entities is much too narrow for linguistic purposes. The real world is only one facet of our vast mental universe.

(c) As defined in CG, **every nominal** has a referent: a particular thing in our mental universe. **It** establishes a discourse referent, which can be referred to by a definite pronoun.

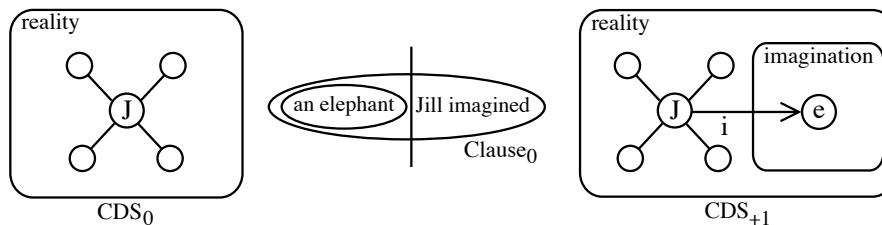
- (11)(a) Proper nouns and demonstratives are *definite* expressions. Quantifiers are *indefinite*.
 (b) Articles are in the middle: *the* is related to the demonstratives, *a* and *sm* to the quantifiers *one* and *some*. The articles are unstressed variants of their counterparts, without enough semantic or phonological substance to stand alone as nominals.
 (c) Definiteness is based on **identification**, where the referent has a *known place* in the substrate. This is most straightforward in the case of discrete, stable, spatially manifested entities, like people and physical objects. These allow **baseline** identification.
 (d) Identification is least straightforward in the case of masses, which lack inherent bounding and have no specific spatial manifestation. For masses, quantifiers provide an **alternative grounding strategy**. Often the referent *cannot* be identified by baseline means.
- (12)(a) In **baseline identification**, the referent either has an *established identity* (a fixed place in the interlocutors' *shared prior knowledge*) or appears in the *immediate context*, where it can be pointed to or otherwise singled out. [*My mother gave me **this** sweater.*]
 (b) Neither way is possible with certain quantifiers, e.g. *nobody*, *any woman*, *most cats*. Their referents are **virtual** in nature, being *imagined* for some purpose, e.g. making a generalization. [***Any woman** wants a diamond ring so **she** can show it to her friends.*]
 (c) A virtual entity is imagined ("conjured up") for a particular local purpose, hence limited to the **mental space** established for that purpose.
 (d) As part of the CDS, the *discourse* itself provides a **non-baseline** means of identification. Once mentioned, a virtual entity is established as a definite discourse referent, being identified by its role in its mental space (now a *known place* in the substrate).
- (13)(a) With an indefinite article, the referent is **momentarily virtual** for the **hearer**. Based on just the *prior substrate* (CDS₀), H has no way to identify it (it "floats unattached").
 (b) Clause₀ provides a basis for connecting it to the substrate. The referent is then *identified*, but can either be actual or virtual: *Jill saw **an elephant*** vs. *Jill imagined **an elephant***.
 (c) The **provisional** virtuality of indefinite articles contrasts with the **inherent** virtuality of certain quantifiers (like *every*, *any*, *no*, *most*).

(14)

(a) *Jill saw an elephant.*

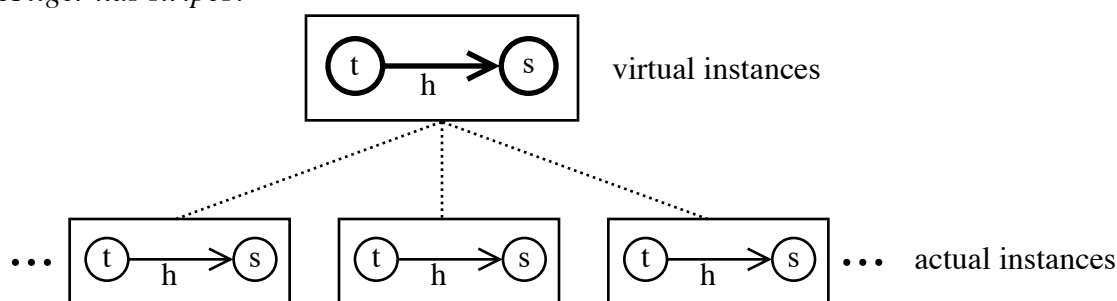


(b) *Jill imagined an elephant.*



- (15)(a) The **definite/indefinite** and **actual/virtual** distinctions are related but not the same.
- (b) Definiteness pertains to *identification* of a referent. It is based on what the interlocutors *know*—its **epistemic status**—and changes through discourse.
- (c) The actual/virtual distinction (roughly, real vs. imagined) depends instead on whether the referent actually exists—its **existential status**. This does not change through discourse.
- (d) All combinations are possible:
- (i) *Jill saw **an elephant**. It was very big.* [actual, unidentified > actual, identified]
- (ii) *Jill imagined **an elephant**. It was very big.* [virtual, unidentified > virtual, identified]
- (16)(a) Baseline identification—based just on the prior substrate—is achieved by proper names (*Jill*), demonstratives (*that dog*), and the definite article (*The phone is ringing*).
- (b) In one alternative, the nominal itself incorporates identifying descriptive content: *the rare vase you bought at the auction; my wife's cousin's mother's neighbor's cat*.
- (c) A nominal is indefinite when the identifying content is only provided by the containing clause (*Jill saw **an elephant***). For H, the referent is momentarily only virtual (imagined).
- (d) The clause identifies it for subsequent purposes; its *epistemic status* changes. Whether its *existential status* changes (from virtual to actual) depends on the clausal content.
- (17) The **actual/virtual** distinction is *relative*, not a strict dichotomy. There are dimensions and degrees of departure from the *baseline reality* of discrete physical real-world entities.
- (a) Many referents are **non-physical**, e.g. mental (*idea*), social (*law*), or abstract (*number*).
- (b) *Reality* can be defined as what has actually occurred. **Unreal**—because they have not (yet) been *realized*—are future occurrences (*He may win*) and conceived alternatives to reality, e.g. with negation (*He didn't win*) and counterfactuals (*If he had won ...*).
- (c) The **alternative worlds** of films, novels, or myths are part of our mental universe. We apprehend them and talk about them (*Santa Claus takes good care of his reindeer*).
- (d) **Other minds**: we cannot directly share the outlook and experience of another conceptualizer, but can only imagine or simulate them. In *Jill is sure the world is flat*, the flat world is in a mental space representing Jill's (not the speaker's) view of reality.
- (e) Various sorts of **mental constructions** involving virtual entities nonetheless pertain to reality and are useful in dealing with it. Examples are hypothetical situations (*If he wins we will celebrate*) and generalizations (*Every nominal has a referent*).

(18) *A tiger has stripes.*



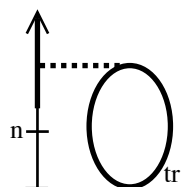
- (19)(a) *A tiger has stripes* invokes **virtual** instances of *tiger*, *have*, and *stripes* in order to generalize over actual occurrences. The virtual instances are **representative** of actual ones but cannot be identified with any particular ones (they “float unattached”).
- (b) The nominals are **indefinite** because the profiled instances are simply “conjured up” in order to generalize. Having *no place in the prior substrate*, they cannot be identified.
- (c) However, their role in this mental construction gives them a place in the substrate, making them definite in subsequent expressions: ***A tiger has stripes. It counts them every day.***
- (d) A valid generalization (*A tiger has stripes*) is “real” compared to an invalid one (*A tiger has feathers*): the situation it describes is an aspect of how our world actually works. It represents a *higher stratum* of reality (specific occurrences being the baseline).
- (20)(a) Quantifiers with grounding as their main function are indefinite because their referents are necessarily virtual, e.g. *nobody*, *any woman*, *every nominal*, *most whisky*, *some tigers*.
- (b) They make generalizations concerning masses, for which identification tends to be problematic (though delimited instances can be definite: ***The guests don’t like this wine.***).
- (c) Instances are usually not known individually or have an established identity. Masses being homogeneous, instances are basically equivalent and interchangeable. In practical terms, we are typically more concerned with quantity than with identification.
- (d) Grounding quantifiers incorporate mental constructions useful in dealing with masses. They concern the epistemic status of the referent, but instead of identification they provide for epistemic control of another sort.

C. Relative Quantifiers

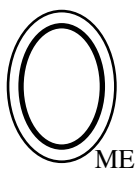
- (21)(a) **Absolute quantifiers:** *many*, *much*, (*a*) *few*, (*a*) *little*, *three*, *several*
- (b) Occurrence as clausal predicates: *Our problems are {many / few / three / ?several}*.
- (c) Co-occurrence with definite grounding: *those three cats*; *our many problems*; *the few houses left standing*; *the little wine we drank*.
- (d) The nominal referent may be actual: *In the room were many cats*.
- (e) They are characterized with respect to a *scale of measurement*.
- (22)(a) **Relative quantifiers:** *all*, *most*, *some*, *no*, *every*, *each*, *any*
- (b) Non-occurrence as clausal predicates: **Our problems are {all / most / no / every / each}*.
- (c) Mutually exclusive with definite grounding: **those all cats*; **our some problems*; **the no houses left standing*; **the any wine we drank*; **this every woman*.
- (d) The nominal referent is always virtual: **In the room were most cats*.
- (e) They are characterized with respect to the *maximal extension* (ME) of a type.

(23)

(a) *many* (ABS/ADJ)

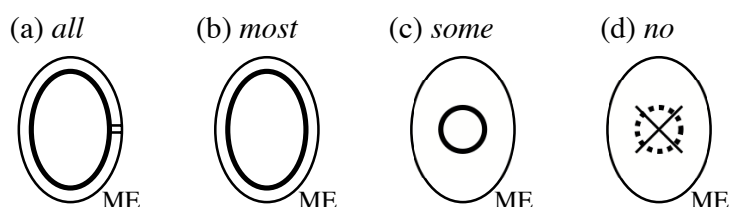


(b) *most* (REL/GR)



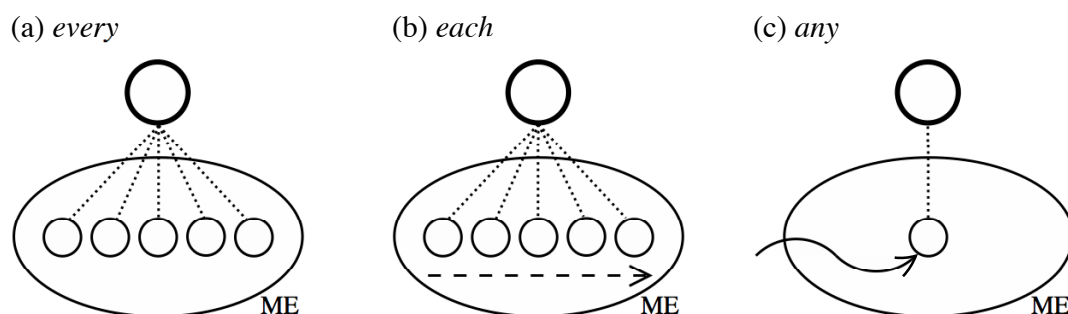
- (24)(a) *Relative quantifiers* are so called because they specify a quantity *in relation to* ME.
- (i) *Most cats are lazy* indicates that a **large proportion** of them are.
 - (ii) *Many cats are lazy* indicates that a **substantial number** of them are.
- (b) When truly maximal and unrestricted (the default), ME is a virtual entity (like *infinity*). It is not limited to any particular time or place, nor to instances that have actually existed.
- (c) ME is sometimes interpreted within a limited *scope of conception*, in which case it might be called the **contextually relevant extension** (RE). This can be actual instead of virtual.
- (d) *The cruise ship sank quickly, but {all / most / some} passengers were rescued.*
- (25) The system of relative quantifiers divides into two basic subsystems.
- (a) **Proportional** quantifiers occur with mass nouns, including plurals: *all {milk / cats}*, *most {milk / cats}*, *some {milk / cats}*, *no {milk / cats}*, but **all cat*, **most cat*.
 - (b) **Representative instance** quantifiers occur with singular count nouns: *every cat*, *each cat*, *any cat*, but **every {milk / cats}*, **each {milk / cats}*.

(26) Proportional quantifiers



- (27)(a) For *all*, '=' indicates that the profiled mass is equal to ME. They coincide but are *functionally distinct*: the nominal referent and the basis for its quantification.
- (b) Like negation in general, *no* invokes a virtual entity but specifies that it is actually excluded from reality—a kind of *mental cancellation* (X). *We found no {milk / cats} in the kitchen* cancels the conceived event by specifying that the quantity involved is zero.
- (c) *All* and *most* are most clearly proportional—like *filling a container* or *almost filling it*. *Some* and *no* are proportional in a more abstract sense: *no particular* proportion or *zero* proportion. The container is either empty or has something in it.
- (d) The empty/non-empty distinction holds for single objects as well as masses. *Some* and *no* can thus occur with singular count nouns: *Some stranger fixed our car*; *No cat can eat that much tuna*. Quantity is not an issue with such nouns—the number is always 'one'.
- (i) *Some* emphasizes indefiniteness (like an emphatic version of *a*).
 - (ii) *No* evokes a single instance but cancels it, so the actual quantity is zero.

(28) Representative instance quantifiers



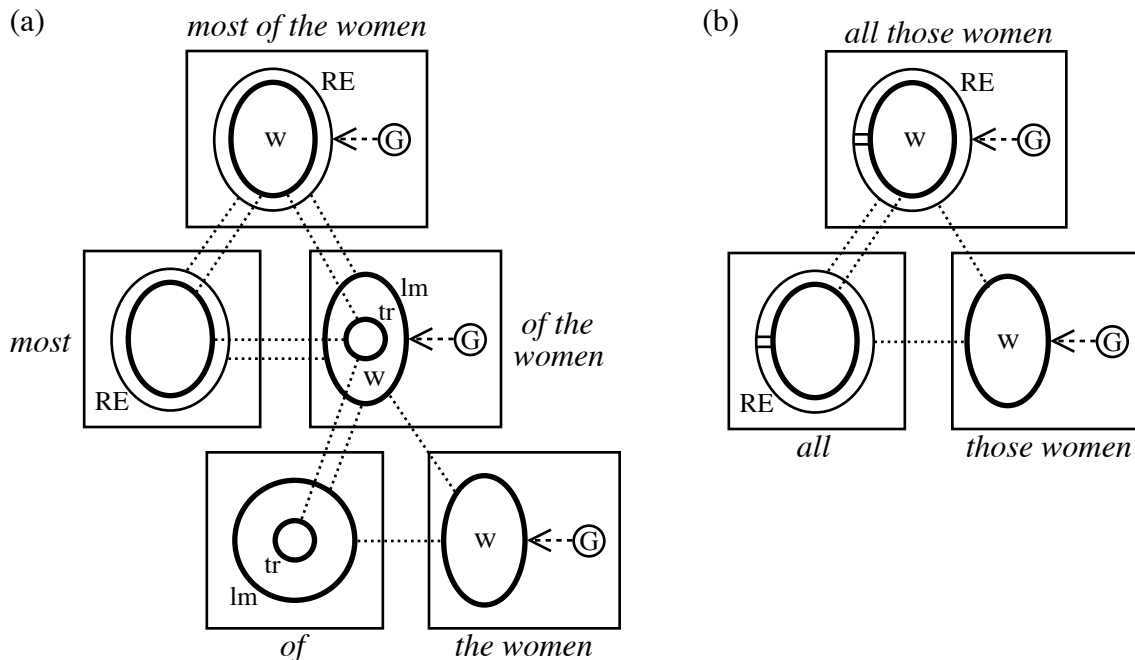
- (29)(a) Representative instance quantifiers occur with *singular count nouns* even though the property described in the clause applies to all instances of the type. The profiled instance is a *virtual* one construed as being *representative* [cf. (18)].
- (b) These quantifiers incorporate **imagined scenarios** representing basic ways of accessing a collection of objects so that all of them can be “reached”. They are all conceived as corresponding to the profiled instance and are therefore covered by the generalization.
- (c) We can access a set of objects by viewing them **simultaneously** (*every*), by examining them **sequentially** (*each*), or by making a **random choice** (*any*).
- (d) These are only virtual activities, invoked for apprehending the connection between the profiled instance and those covered by the generalization. Still, they result in subtly different meanings that help explain the uses of the quantifiers.
- (30)(a) *The air is so clear that you can see {every / each / any} peak in that mountain range.*
- (b)(i) {Every / Each / Any} cat likes tuna. (ii) {*Every / *Each / Any} milk will spoil if not kept cool. (iii) {*Every / *Each / Any} cats will fight with one another.
- (c) *Take a card—{any / *every / *each} card.* [magician performing a card trick]
- (d) Degrees of individuation: *all < every < each < any.*
- (i) *All cats are similar > {?Every > ?*Each > *Any} cat is similar.*
- (ii) *She questioned {?all the boys / ?every boy / each boy / *any boy} in turn.*
- (iii) *{Every one / Each (one)} said that he didn’t break the window.*
- (31)(a) Relative “quantifiers” do not really specify *quantity*, but **degree of universality** in ME.
- (b) *All, every, each, and any* are **universal**. *No* specifies **universal exclusion**. *Most* **approximates** universality. *Some* is quite **vague** about quantity (excluding only zero).
- (c) They provide an alternate form of **epistemic control**: generalizations pertaining to an open-ended set of entities (as opposed to specific knowledge about identified referents).
- (d) *My cat is lazy* is definite and quite specific, but applies to only one creature. *Most cats are lazy* is very widely applicable, even if it leaves some uncertainty in any particular case.
- (32)(a) The function of a nominal is **coordinated mental reference**, where both interlocutors momentarily focus attention on a particular thing in their shared mental universe.
- (b) For the referent to be the same, it must somehow be **identified** (*identification* in a broad sense); some **connecting path** must relate it to the ground (*grounding* in a broad sense).
- (c) Grounding indicates the referent’s **epistemic status**: what the interlocutors *know* about its identity. **Definiteness** pertains to when and how the referent is identified.
- (d) A *definite* nominal is one whose referent is **identified** (narrow sense) on the basis of the **prior substrate** (CDS₀), i.e. independently of the clause containing it [(2)]:
- (i) The referent may have an **established identity** (as with proper names).
- (ii) It can be singled out by a definite **grounding element** (*grounding* in a narrow sense).
- (iii) Definite referents are typically actual but can be virtual (e.g. *Santa Claus*).
- (33)(a) The referent of an *indefinite* nominal **cannot** be identified on the basis of the prior substrate. For the hearer it is momentarily **unidentified** (a negative epistemic status).
- (b) Without a known place in the substrate, the referent is **virtual** from the standpoint of H (it “floats unattached”). But its status changes due to its role in the clause containing it.
- (c) Its role in the clause gives the referent a place in the **updated substrate** (CDS₊₁). Now identified (in the broad sense), it is definite for subsequent discourse purposes.
- (d) Its clausal role may establish the referent as an actual, real-world entity. Alternatively, it may prove virtual (confined to a special mental space).

- (34)(a) **Relative quantifiers** are overt grounding elements (grounding in the narrow sense).
 (b) They represent an alternative to identification (narrow sense) as a means of **epistemic control**, allowing *generalizations* over the **maximal extension** of a type (ME).
 (c) Being conjured up just for that purpose, and characterized only by degree of universality in ME, the referent is **virtual**. Lacking prior identification, the nominal is **indefinite**.
 (d) Still, the referent's role in making the generalization serves to identify it (in the broad sense), making it definite in the following discourse.

D. Contextually Relevant Extension

- (35)(a) The generalizations achieved with relative quantifiers often pertain to a **contextually relevant extension** (RE), rather than the maximal extension (ME).
 (b) The limited scope of interpretation may be evident just from the discourse context:
 (i) *It was really a hard exam. {All / Most / Some} students failed.*
 (ii) *When they extinguished the library fire, {no / every} book suffered water damage.*
 (c) A limiting construction: RELATIVE QUANTIFIER (*one*) + *of* + DEFINITE NOMINAL
 (d) *all, most, some, none* (= *no + one*), *every one*, *each (one)*, *any (one)*
 (e) *all of the books, most of her children, some of them, none of those dogs, every one of the candidates, each (one) of us, any (one) of those elephants*
- (36)(a) *Of* profiles a relationship that is intrinsic or natural (as opposed to extrinsic or accidental).
 (b) *the students {of / with} that teacher* *the color of her hair* vs. *the gray in her hair*
 (c) Part-whole: *the tip of my finger; the seat of this chair; the center of Beijing*
 (d) Identity: *the state of California; the month of April; a row of trees; an act of treason*

(37)



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