A foray into the lexical semantics of distributivity
[Work in Progress]

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Please note that this talk is not really 35 pages long; there is just a very long appendix of data.

Outline

§1: Background

§2: Factors affecting whether a predicate will be interpreted as distributive

- Some obvious factors:
    - grammatical properties of the subject
    - (in)definiteness of the object; plurality of the object
- ⋆ Some less obvious, more puzzling factors
    - ⋆ the (in)transitivity of the predicate
    - ⋆ the (a)telicity of the predicate

§3: Searching for an explanation of the (in)transitivity and (a)telicity data

1 Introduction

1.1 What is distributivity?

- **Distributivity** is a property of interpretations of predicates; it is opposed to **collectivity** (see Champollion 2015 for an overview)

- A distributive interpretation of a predicate is one in which the predicate is understood to be separately true of every member of a multi-part (i.e. conjoined, plural, or group-denoting) subject

    (1)   Ana and Bob built a raft   adapted from Champollion 2015:3
        a.   ✓Distributive interpretation: each built their own raft [2 rafts]
        b.   ✓Collective interpretation: worked together to build a single raft [1 raft]

- Predicates can have both distributive and collective interpretations available; or they can be only distributive; or only collective

(2) BOTH: Ana and Bob built a raft

    a. ✓Distributive interpretation: each built their own raft [2 rafts]

    b. ✓Collective interpretation: worked together to build a single raft [1 raft]

(3) ONLY DISTRIBUTIVE: Ana and Bob laughed

    a. ✓Distributive interpretation: Anna laughed and Bob laughed

    b. ✗Collective interpretation: Anna and Bob worked together to laugh jointly without each laughing separately

(4) ONLY COLLECTIVE: Ana and Bob met up

    a. ✗Distributive interpretation: Ana met up and Bob met up

    b. ✓Collective interpretation: Ana and Bob worked together to jointly meet up without each meeting up separately

- We can think of distributivity with respect to different arguments of the verb - not only the subject or agent, but also the object or theme (Lasersohn 1993)

- I'm using the terms *subject* and *object* because I don't want to commit to any of the baggage associated with *agents* and *patients*

(5) Ana and Bob laughed
Did Ana laugh? Did Bob laugh? Yes: "subject-distributive"

(6) Ana solved this puzzle and that one
Did Ana solve this puzzle? Did she solve that one? Yes: "object-distributive"

(7) Ana and Bob met up
Did Ana meet up? Did Bob meet up? Not really: "subject-collective"

(8) Ana combined this cup of water and that one
Did Ana combine this cup of water? Did she combine that one? Not really: "object-collective"

- Experiments show (Brooks & Braine 1996, Kaup *et al.* 2002, Pagliarini *et al.* 2012) that predicates with both interpretations available are preferentially interpreted as collective

(9) Ana and Bob carried a suitcase
(people want this to be collective even though it can technically also be distributive)

- Two types of inference:

(10) Ana and Bob saw a movie

- (I) Inference to conjunction - e.g. inferring from (10) that Ana saw a movie and Bob saw a movie. This type of inference (an strong implication or even an entailment) is emphasized in theoretical work

- (II) Inference that the event involved joint action - e.g. inferring from (10) that Ana and Bob participated in a joint social event of seeing a movie. This type of inference seems to be pragmatic – *not* what I'm going to focus on today

- A separate issue, which we won't focus on today, but which we need to distinguish from collectivity: **cumulativity**

- Cumulativity involves *two* plural entities interacting in a "cross-product-like" (Champollion 2015) fashion, as in (11-c)

  (11)   Ana and Bob sent letters
     a.   *distributive interpretation:* Ana sent letters, Bob sent letters
     b.   *collective interpretation:* Ana and Bob worked together to send some letters (Ana wrote and addressed them, Bob took them to the post office)
     c.   *cumulative interpretation:* Ana sent a letter, Bob sent a letter – so that they only jointly sent *letters*, but each one sent *a letter* individually

1.2   Some distributivity inferences are grounded in the lexicon

- At least some distributivity inferences are generally believed to be grounded in the lexical semantics of the predicate (Scha 1981, Lasersohn 1993, Roberts 1987, Winter 1997, Champollion 2015, de Vries 2015)

  (12)   Ana and Bob are pop stars *implies* Ana is a pop star

  (13)   Ana and Bob walked *implies* Ana walked

  (14)   Ana and Bob died *implies* Ana died

- This is sometimes captured by saying that the inherently, lexically distributive predicate has only atoms in its extension – *walk* only applies to atoms like *Ana*, not composites like *Ana and Bob*, so we apply *walk* separately to Ana and Bob (e.g. Link 1983)

- Also sometimes captured as a meaning postulate – stating that whenever a group of individuals walks, each of them does (e.g. Scha 1981, Winter 1997)

- However we state it, we want to recognize that a predicate's distributivity properties are not idiosyncratic, but deeply tied to meaning in a way that we would expect to hold across multiple predicates with similar meanings, and also to hold for the same predicate in different languages

- "What is it to *be a pop star* or to *walk* or to *die*? The actions or states denoted by these verbs can generally only be performed or endured by an individual with a single will and consciousness. It is for this reason that we think of them as distributive. Although it may well be that only atomic individuals are in the extension of such distributive verbs in their strict sense, **this follows from our knowledge of what is required for them to be true of an individual**" (Roberts 1987:124)

- Apart from lexical/inherent distributivity, *other* distributivity inferences (generally those involving covarying indefinites or bound pronouns) are also generally believed to be grounded in an optional, silent operator, D (first attributed to Link 1991, which was written in 1984, and Roberts 1987 – see Champollion 2015), with the semantics of *each*

- Although it is generally agreed that many distributivity inferences are grounded in lexical semantics and world knowledge, many questions remain open:

  - Which predicates are lexically distributive, and why? What predictions can we make about when a predicate's lexical semantics will make it distributive?
  - We'd expect these predictions to also hold cross-linguistically: do they?
  - How are the distributivity properties of a VP built up from the lexical semantics of its verb, as well as any adverbs, prepositional phrases, and objects in the VP?
  - In particular, for transitive VPs, what is the contribution of the verb's lexical semantics, and what is the contribution of the object? (We'll need to consider both its grammatical properties such as plurality or massness, and any contribution of world knowledge that is tied to the object)

- There has been some work on which *adjectival* predicates are distributive or not, and attempts to derive this behavior from pragmatic factors (Scontras & Goodman 2015)

  (15)   The boxes are large   Schwarzschild 2009
          ✓Each box is large
          ✗Each box is not individually large, but the boxes are collectively large

- ...but there has been very little work in the realm of VP predicates (so, this is what I am trying to do in my dissertation!)

2 Factors affecting (non)distributivity

- First we'll talk about some fairly obvious factors: the grammatical properties of the subject; the (in)definiteness of the object; and the plurality of the object

- Then we'll talk about two, somewhat less obvious / more interesting factors affecting whether a predicate is interpreted as distributive or not: the (in)transitivity of the verb involved; and the (a)telicity of the predicate

- Then, in §3, I'll try to suggest where we might look for an explanation of these two less-obvious factors

2.1   The subject

- First, some well known factors ...

- I've chosen the conjoined subject *Ana and Bob* in my examples here because it lends itself to distributive readings when those are available, and because it avoids the "non-maximality" issues that arise when we use definite plurals or group nouns

- But using a different sort of subject (a group noun, a plural definite, a conventionalized coordination) also affects whether we view a given predicate as distributive, collective, or both in context

   (16)   The Army noticed a problem (vs. Ana and Bob noticed a problem)
   maybe only a few people in charge of the Army noticed a problem, not every member of the Army

   (17)   The rangers noticed a problem (vs. Ana and Bob noticed a problem)
   maybe the rangers act with a collective consciousness

   (18)   The team built a raft
   perhaps even harder to get the interpretation where each team member built a separate raft

   (19)   The talent scouts laughed at her
   maybe not literally every talent scout laughed at her ...
   "non-maximality" (Lasersohn relates this non-maximality to "pragmatic haloes")

   (20)   Simon and Garfunkel sang the National Anthem at the Super Bowl (based on Winter 2001)
   Is it true that 'Simon sang the National Anthem at the Super Bowl? Maybe not

2.2   (In)definiteness of the object

- Depending on whether we use an indefinite or a definite object, certain predicates may lose their potential for a distributive interpretation

   - Generally, predicates describing non-reversible changes of state, or predicates of creation/destruction, most favor a collective interpretation when their object is definite

   (21)   Ana and Bob built a raft
   both interpretations available: maybe they each built their own raft, or maybe they built one together

(22) Ana and Bob built the raft
only collective interpretation is plausible

(23) Ana and Bob killed a rat
both interpretations available

(24) Ana and Bob killed Cara
only collective interpretation is plausible

2.3 Plurality of the object

- We'll come back to this issue when we talk about telicity ...

- It seems that VPs with plural objects *always* have a non-distributive (*cumulative*) interpretation available – even if the verb's lexical semantics seem to make predicates built from that verb distributive in other contexts

  (25) Ana and Bob noticed a problem
  distributive; implies Ana noticed a problem and Bob noticed a problem

  (26) Ana and Bob noticed problems
  both a distributive and a non-distributive interpretation available: maybe Ana noticed problems and Bob noticed problems (*distributive*); or maybe Ana noticed a problem and Bob noticed a problem, so that they only jointly noticed *problems* (*cumulative*)

2.4 (In)transitivity of the VP

- Moving on to some more exciting, less explored factors affecting whether a predicate will be interpreted as distributive ...

- You may have noticed that many of the predicates we've mentioned as lexically distributive (*sleep, laugh, die, walk, be a pop star, be large*) are one-place predicates, whereas many of the predicates we've mentioned as having both interpretations available (*build a raft*) are two-place predicates involving a transitive verb and a (singular) object

- In fact, Link 1983 hints at this observation: he cites the transitive VP *carry the piano* as an example of a both-interpretations-available predicate, and then notes, "Common nouns [such as *pop star*] and intransitive verbs like *die*, however, seem to admit only atoms in their extension. I call such predicates *distributive*" (p. 132)

- He reiterates: "Most of the basic count nouns like *child* are taken as distributive, similarly IV [intransitive verb] phrases like *die* or *see*" (Link 1983:141)

- To my knowledge, this observation has not yet been tested or explained

- So, is Link correct? Are intransitive predicates generally distributive? Are transitive predicates more likely to have both distributive and collective interpretations available? [spoiler: yes]

- To test this claim, I coded a database of the verbs of Levin 1993

- Over 3,000 verbs, categorized by meaning (e.g. verbs of inherently directed motion, verbs of removing, verbs of animal sounds . . .)

- Developed a scheme for coding verbs on their subjects and objects, as applicable, and coded them

  – You might disagree with some of the choices made in designing this coding scheme, and I am open to discussing these disagreements; but I also think it is interesting to see where this particular set of choices gets us

Coding intransitive verbs on the subject argument

- I coded intransitive verbs for distributivity on their subject arguments by using this test:

  (27)   Does *Ana and Bob VERBED* strongly imply (out of the blue) that *Ana VERBED?*
      a.   If "yes": VERB is distributive on its subject argument (28)
      b.   If "not really": VERB is collective on its subject argument (29)
      c.   If there's one interpretation where the answer is "yes," and another distinct interpretation where the answer is "no" or "not really", VERB has both distributive and collective interpretations available for its subject argument (30)

  (28)   Ana and Bob swam *implies* Ana swam

  (29)   Ana and Bob reunited *does not imply* Ana reunited

  (30)   Ana and Bob cooperated – *tricky;* maybe they cooperated with each other; maybe they cooperated with a third party . . .

Coding transitive verbs for distributivity on the subject argument

- It is tricky to code transitive *verbs* for their distributivity properties when transitive verbs really only appear in VPs with an object – which also has an effect on the VP's distributivity properties

- I made a subjective (but, I argue, motivated and consistent) decision to code transitive verbs for distributivity by putting them in VPs with a *singular, indefinite object,* as in the popular example *Ana and Bob built a raft*

- (I know indefinites are tricky because they can take wide or narrow scope, but I decided that is coding scheme was best for what I was trying to accomplish. Please see the Appendix 1 for discussion of why, as well as discussion of the scope issue)

(31)   Does *Ana and Bob VERBED [singular indefinite]* strongly imply that *Ana VERBED [singular indefinite]*?
   a.   If "yes": VERB is distributive on its subject argument (32)
   b.   If "not really": VERB is collective on its subject argument [no examples found]
   c.   If there's one interpretation where the answer is "yes," and another distinct interpretation where the answer is "no" or "not really", VERB allows both a distributive and a collective interpretation on its subject argument (33)

(32)   Ana and Bob noticed a person *implies* Ana noticed a person

(33)   Ana and Bob killed a mosquito
         both interpretations available: maybe they killed one mosquito together, maybe each killed one separately

Coding transitive verbs for distributivity on the object argument

- Finally, I coded transitive verbs for distributivity on their *object* arguments using the following diagnostic:

(34)   Does *Ana VERBED Bob and Cara* strongly imply *Ana VERBED Bob*?
         if yes: VERB is distributive on object argument
         if not really: VERB is collective on object argument

- When the verb does not select an animate object, I used "this obj and that obj" instead of "Bob and Cara"

- We can use definites and names here because we don't have the problem we encountered above, where using a definite/name causes verbs of irreversible actions to be coded systematically differently than verbs denoting reversible or non-change-of-state actions

- For example:

(35)   Ana saw Bob and Cara *implies* Ana saw Bob, Ana saw Cara

(36)   Ana hugged Bob and Cara *implies* Ana hugged Bob, Ana hugged Cara

(37)   Ana broke this vase and that one *implies* Ana broke this vase, Ana broke that vase

(38)   Ana combined this ingredient and that one *does not imply* Ana combined this ingredient

- I used the singular subject, Ana, because plural/conjoined subjects can give rise to the confounding issue of **cumulativity**

  (39)   Ana and Bob saw Cara and Dave
          maybe Ana saw Cara and Dave; and Bob saw Cara and Dave; or maybe Ana saw Cara and Bob saw Dave . . .

Results

- We notice some striking trends!

- **Intransitive verbs** (or to be more precise, one-word VPs made from an intransitive verb) *overwhelmingly* **tend to be distributive on their subject argument** (but, with exceptions!) – as Link suggested in 1983

- This trend is true for both unergative and unaccusative intransitive verbs (reminder: unaccusative verbs are those where the subject has the role of 'patient', unergative verbs are those where the subject has the role of 'agent'; unaccusative verbs can often also appear as transitive verbs with the patient as the object, as in *the whale sank the ship/the ship sank* – Perlmutter 1978, Levin & Rappaport Hovav 1995)

  (40)   Ana and Bob swam, ran, kayaked, exercised, laughed, cried, smiled, slept . . .

  (41)   Ana and Bob returned, arrived, departed, exited, left, drowned, died, fainted . . .

- Some exceptions:

  (42)   Ana and Bob coexisted, cooperated, corresponded, coordinated, dated, kissed, convened, met, met up, gathered

  (43)   The bees swarmed, abounded . . .

- Some verbs that are very hard to code / seem to depend heavily on context:

  (44)   Ana and Bob talked, chatted, spoke, danced

- *Ana and Bob danced* usually does tell us that Ana danced and Bob danced; but we also usually infer that Ana and Bob danced together . . . so it sort of feels like we are missing something to code these highly social verbs as distributive . . .

- *Transitive verbs* **(or transitive VPs made from a transitive verb and a singular, indefinite object) tend to allow both distributive and collective interpretations on their subject argument** – but this trend is not as strong as the trend for intransitive verbs to be distributive on their subject argument

(45)   Ana and Bob built a raft
maybe they built a raft together, maybe they each built one

(46)   Ana and Bob killed a rat
maybe they killed a rat together, maybe they each killed one

(47)   Ana and Bob wrote a book

(48)   Ana and Bob sold a house

(49)   Ana and Bob advertised a job

(50)   Ana and Bob painted a wall

(51)   Ana and Bob waved a flag

- There are exceptions, though: transitive verbs describing mental attitudes tend to be distributive; some transitive VPs seem to want to be distributive because we know that the action denoted by the VP is usually done individually (which depends on the object as well as the verb) . . .

(52)   Ana and Bob saw a problem
implies Ana saw a problem

(53)   Ana and Bob noticed a problem
implies Ana noticed a problem

(54)   Ana and Bob like a book
implies Ana likes a book

(55)   Ana and Bob want a book
implies Ana wants a book

(56)   Ana and Bob admire a professor
implies Ana admires a professor

(57)   Ana and Bob hit a home run
rules of baseball do not permit a home run to be hit collectively

(58)   Ana and Bob wore a camel costume vs. Ana and Bob wore a dress
a camel costume could be worn by multiple people together, whereas a dress usually is not

- There are also other exceptions, often relating to verbs of physical contact . . .

(59)   Ana and Bob nibbled a sandwich
distributive; hard to collectively nibble a sandwich, given that nibbling involves specific movements of the mouth and people usually do not share a mouth

(60)   Ana and Bob hugged a person
distributive; hard to imagine 2 people collectively hugging a person without what EACH of them does being described as a hug ...

(61)   Germany and Switzerland border France
distributive; impossible to imagine an arrangement of countries where A and B borders C does not entail that A borders C ...

- Finally, **transitive VPs are *overwhelmingly* distributive on their object arguments** (but with some exceptions). This trend is quite strong.

(62)   Ana saw Bob and Cara *implies* Ana saw Bob

(63)   Ana broke this vase and that vase *implies* Ana broke this vase

(64)   Ana wrote this book and that book *implies* Ana wrote this book

(65)   Ana bought this book and that book *implies* Ana bought this book

(66)   Ana met Bob and Cara *implies* Ana met Bob

(67)   Ana ate this sandwich and that sandwich *implies* Ana ate this sandwich

- The main exceptions to this trend seem to be verbs of combining or uncombining

(68)   Ana combined this idea and that idea *??implies??* Ana combined this idea

(69)   Ana interleaved this idea and that idea *??implies* Ana interleaved this idea

(70)   Ana switched this meeting and that meeting *??implies* Ana switched this meeting (well, maybe)

(71)   Ana alternated this color with that color *??implies* Ana alternated this color

- **Three-argument verbs allow both distributive and collective interpretations**

(72)   Ana traded this hat and that hat for an umbrella
maybe traded 1 hat for 1 umbrella, the other hat for another umbrella; or both hats for 1 umbrella

(73)   Ana gave Bob and Cara a hat
maybe gave Bob a hat and gave Cara another hat; maybe gave 1 hat to the two of them ...

- To sum up:

	Trend	*Examples*	*Exceptions*
Intransitive subjects	Strongly distributive	Ana & Bob walked	Ana & Bob convened
Transitive subjects	Often allow both interpretations	Ana & Bob built a raft	Ana & Bob saw a problem
Transitive objects	Strongly distributive	Ana broke this vase and that vase	Ana alternated this color and that color

	Both	*Distributive*	*Collective*	*Not sure*	*Total*
Transitive subj	2057 (90%)	182 (8%)	0 (0%)	64 (2%)	2303
Transitive obj / Unaccusative subj	85 (4%)	2108 (90%)	1 (0%)	150 (7%)	2344
Intransitive-only subj	26 (3%)	656 (84%)	83 (11%)	23 (2%)	788

Please see Appendix 2 for the actual verbs coded in each category

2.5 (A)telicity of the VP

- Also, we notice some interesting correlations between distributivity and telicity - but the relationship is not straightforward

- There are predicates that are {telic, atelic} and {distributive, collective, BOTH} in any combination

- *(although some of these cells are easier to fill than others, and some of the cells cannot be filled easily by just a verb with a singular, indefinite object - need a particular sort of object or an adverb to get the right properties ...)*

	Telic	*Atelic*
Distributive	Ana and Bob arrived; Ana and Bob noticed an error	Ana and Bob swam; Ana and Bob thought about politics
Both	Ana and Bob got married; Ana and Bob built a raft	Ana and Bob cooperated
Collective	Ana and Bob built a raft together	Ana and Bob coexisted

- However, there are also some striking cases where distributivity seems to be associated with atelicity; and having a collective interpretation in addition to or instead of a distributive interpretation seems to be associated with telicity, making us wonder how they are related

  - Champollion 2010 spells out the formal parallel between atelicity, unboundedness and distributivity (all three distribute down to parts: atelic predicates are true

of their subintervals, the parts of a mass noun still count as that mass noun; and distributive predicates are true of the sub-parts of the subject), but does not make specific predictions about e.g., whether an atelic predicate will be distributive

Atelicizing a telic predicate with both interpretations available *often* forces it to be distributive

- In general, some predicates get their telicity properties from grammatical properties of the direct object (e.g. Krifka 1992) – in particular, incremental theme predicates display this behavior (Tenny 1987, Krifka 1992)

- Having a bounded (singular, count) object makes such a predicate telic, while having a plural, mass, or implicit object makes it atelic (e.g. Krifka 1992)

  (74)   a.   Ana ate an apple [telic]
         b.   Ana ate apples [atelic]
         c.   Ana ate applesauce [atelic]
         d.   Ana ate [atelic]

- If we take a both-interpretation incremental theme predicate and make it *atelic* by making the object mass or implicit, it often becomes distributive (75-c)-(75-d)

- *However*, interestingly, making the predicate atelic by giving it a *plural* object, it does not necessarily become distributive, because it has a cumulative reading available

  (75)   a.   Ana and Bob ate an apple [telic, both interpretations available]
         b.   Ana and Bob ate apples [atelic; distributive and cumulative interpretation available] - maybe Ana ate an apple and Bob ate an apple, so neither separately ate *apples* (*cumulative*)
         c.   Ana and Bob ate applesauce [atelic, distributive]
         d.   Ana and Bob ate [atelic, distributive]

Interpreting the *same* predicate atelically vs. telically affects its distributivity properties

- Some predicates can be interpreted as either telic or atelic

- In some such cases, the telic construal admits both a distributive and a collective interpretation while the atelic construal is distributive

  (76)   Ana and Bob wiped the table
         a.   Telic reading: Ana and Bob worked together to wipe a table's entire surface; or each wiped it separately [*both distributive and collective* interpretations available]
         b.   Atelic reading: Ana wiped some portion of the table (not necessarily the entire surface), and Bob wiped some portion of the table [*distributive*]

(77)   Ana and Bob ate the cake
   a.   Telic reading, e.g. meaning that Ana and Bob worked together to consume the entire cake: *collective*
   b.   Atelic reading, e.g. in a context where whoever ate (any portion of) the cake last night might get food poisoning: *distributive*, since each of them ate at least some cake

- We also sense that the (non)distributivity of a predicate has something to do with how the object is affected by the event described by the VP ...

(78)   Ana and Bob evacuated a building
   distributive in a scenario where Ana and Bob themselves exited a building
   both interpretations available in a scenario where Ana and Bob are safety officials and caused other people to leave a building

- To sum up:

  - There is no obvious, straightforward relationship between (non)distributivity and (a)telicity

  - But – not surprisingly, because atelicity, distributivity and unboundedness are deeply related on a formal level (Champollion 2010) – there is an intriguing connection, such that telic predicates seem to favor allowing a collective reading as well as a distributive reading, whereas atelic predicates favor distributivity

  - Why is this? How can we capture this subtle relationship?

3   Towards some solutions

- I am convinced that the transitivity puzzle and the telicity puzzle are two parts of the same elephant

- Both puzzles revolve around the question: how much VP-ing can you engage in as part of a multi-part subject without VP being separately true of you?

- If any amount of VP-ing makes VP true of you, the VP will be distributive

- But if you can *help to bring about* a VP event without VP separately being true of you, a collective interpretation will also be available

- We've seen that both a VP's transitivity and its telicity seem to affect whether you can engage in as part of a multi-part subject without VP being separately true of you

3.1 A path towards a partial solution

- I'm just going to struggle with the asymmetry between transitive and intransitive subjects; and the telicity data – leaving transitive objects for another day

- Many sentences built from transitive VPs involve the subject bringing about a change on an object

- Some transitive VPs lexicalize a scalar change (Rappaport Hovav 2008), meaning that the transitive verb specifies that over the course of the event described by the verb, the object will change along a specific dimension (Kennedy & McNally 2005)

    - For example, *kill* specifies that its object changes from *alive* to *not alive* [a change along a two-point scale]

    - *Lengthen* specifies that its object changes along the dimension of *length* [a change along a multi-point scale] (Hay *et al.* 1999)

- Other transitive VPs do not lexicalize a scale themselves, but can get a scale from their object: so-called *incremental theme verbs*; over the course of the event, the object changes in a specific dimension in tandem with the progress of the event

    - For example, *eat* can take a bounded object (*an apple*) to create a VP that describes an incremental change in the apple paralleling the progress of the apple-eating event (at the beginning of the apple-eating event, the apple is uneaten; halfway through the apple-eating event, the apple is half-eaten; at the end, it is fully eaten) (Krifka 1992)

    - When the object of *eat* is not bounded (*eat applesauce*), it is not an incremental theme predicate because there is no bounded amount of applesauce to parallel the progress of the applesauce-eating event

- Both VPs built from scalar-change verbs (*kill a rat, lengthen the trousers*) and VPs build from incremental theme predicates (*eat an apple* describe scalar changes realized on an object

- When a VP describes a scalar change brought about on an object, then one individual member of a multi-part subject can *help* to bring about the scalar change – can move the object *partway* along the scale, if it's a multipoint scale, or can *contribute* to causing the object to move along the scale – but if that individual does not single-handedly bring about the change on the object, then the VP will not be separately true of that subject

    (79)   Ana and Bob built a raft
            an incremental theme predicate; describes bringing about a scalar change on the raft [coming into existence]

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Ana can *help* move a raft along the scale from [unbuilt, built], but if she does not singlehandedly move a raft along this scale, then *built a raft* is not separately true of her

- Therefore, *at least* transitive VPs describing scalar change realized on an object should have both a distributive and a collective reading

  - VPs describing scalar change realized on an object are often telic, explaining why both transitivity and telicity seem associated with having a collective reading instead of or in addition to a distributive reading

- In contrast, **intransitive VPs** do not typically describe subjects bringing about a change on an object, since there is no object

- Therefore, the change described by non-stative intransitive VPs is undergone by the *subject* (whether the VP is unergative or unaccusative; and whether the change is scalar or nonscalar)

- Nonstative intransitive verbs can lexicalize scalar or nonscalar changes (Rappaport Hovav 2008):

  (80)   Ana died/arrived/left/exited [scalar]

  (81)   Ana danced/swam/laughed/kayaked [nonscalar]

- But in any of these cases, it is the *subject* who is undergoing this change

- In the case of scalar intransitive verbs, the only way for a member of the subject to participate in the scalar change is to undergo it – so that any participation at all in a *verb* event counts as *verbing*

  (82)   Ana and Bob died, arrived, left, exited, fainted

- These are all-or-nothing changes, so the only way for Ana to participate as the subject of a *verb* event is to undergo the change – which counts as *verb*-ing, making the VP separately true of her and therefore making the VP distributive

- In the case of nonscalar intransitive verbs, these are atelic and thus have the subinterval property (Cresswell 1986 traces the first use of this term to L. Carlson 1981: 48), meaning that even the smallest amount of *verb*-ing counts as *verb*-ing

  (83)   Ana and Bob danced, laughed, swam

- The only way for Ana to participate as the subject in one of these events is to engage in *verb*-ing – but even the briefest amount of *verb*-ing counts as having *verb*-ed – making the VP separately true of Ana, and thus making the VP distributive

- The crucial difference between transitive and intransitive subjects, then: transitive verbs can describe subjects bringing about a change on an object, and it is possible to help to bring about a change described by a VP without separately VP-ing onself; whereas non-stative intransitive verbs describe subjects participating in changes; and the only way to participate in such a change is to participate in it oneself

- The crucial difference between telic and atelic transitive predicates: predicates describing scalar change realized on an object tend to be telic (exception: atelic readings of 'degree achievements' such as *lengthen* – see Hay *et al.* 1999), and predicates describing a scalar change realized on an object are predicates where a member of the subject can help to bring about the change without fully VP-ing alone

- Of course, I need to formalize all of this and make it much more precise

- Also, this can't be the whole story, because *not all* VPs that allow both a distributive and a collective interpretation are VPs describing a scalar change realized on an object

(84)   Ana and Bob hit a fence
        ✓Distributive reading: Ana hit a fence and Bob hit a fence
        ✓Collective reading: Ana and Bob worked together (perhaps by jointly holding a pole?) to hit a fence

(85)   Ana and Bob waved a flag
        ✓Distributive reading: Ana waved a flag and Bob waved a flag
        ✓Collective reading: Ana and Bob worked together (perhaps by jointly holding a pole?) to wave a single, large flag

- Next up: Turk experiments to confirm my introspective judgments

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Appendix 1: Why singular indefinites?

- It is tricky to code a transitive *verb* for its distributivity properties when transitive verbs appear in VPs with an object . . . ; we need to think carefully about how the object will also affect the distributivity properties of the VP

- Why did I choose a singular, indefinite object?

- The object needs to be singular, because VPs with plural objects *invariably* allow both distributive and cumulative interpretations

  (86)   Ana and Bob noticed people
  distributive or cumulative: maybe Ana noticed people and Bob noticed people; or maybe Ana noticed a person and Bob noticed a person, so they only noticed *people* together

  (87)   Ana and Bob noticed Cara
  distributive: we infer that Ana noticed Cara and Bob noticed Cara

  (88)   Ana and Bob cleaned tables
  distributive or cumulative: maybe Ana cleaned tables and Bob cleaned tables; or maybe Ana cleaned a table and Bob cleaned 2 tables, so it's *not* true that *Ana cleaned tables*

  (89)   Ana and Bob cleaned the table
  both interpretations available: maybe Ana cleaned it and then Bob cleaned it; or maybe they cleaned it together

- The object needs to be indefinite, because definite and proper name objects give rise to collective interpretations for verbs denoting irreversible actions (90), but allow both or distributive interpretations for verbs denoting reversible actions or non-changes-of-state (91)-(96).

  (90)   Ana and Bob killed Cara
  only interpreted *collectively* in a situation where a person cannot be killed more than once

  (91)   Ana and Bob cleaned the table
  both interpretations available, because maybe Ana and Bob jointly cleaned the table, or maybe Ana cleaned it and then it got dirty again, and then Bob cleaned it

  (92)   Ana and Bob noticed Cara
  distributive, because we infer that Ana noticed Cara and Bob noticed Cara

- I decided that for this project, I did not want the irreversibility issue to confound the data on distributivity

- (When the action is NOT a change of state, then it does not matter if we use a definite or a name, or an indefinite)

- When we code for distributivity using indefinite, singular objects, we avoid both of these problems

- Not all VPs are coded as "both," as tends to happen with plural objects. And we do not code irreversible actions as inherently collective:

(93)   Ana and Bob killed a rat
        both interpretations available: maybe they worked together to kill a rat, or
        maybe Ana killed one and Bob killed one

- This coding scheme also leads us to code *kill* as allowing both distributive and collective
  interpretations on the subject argument, consistent with other literature (Lasersohn
  1993:152) rather than subject-collective, which it would be if we gave it a definite or
  proper-name object

- Of course, indefinites are tricky, because they can take wide or narrow scope

- In general, the narrow-scope indefinite reading of a transitive VP with an indefinite
  object is *only* ever distributive ((94), (95), (96))

- The wide-scope indefinite reading is more flexible . . .

    - . . . it *will be* collective if the verb describes an irreversible change-of-state (94)

    - . . . it *will not* be collective if the verb's lexical semantics require it to be distributive (96)

    - . . . it *need not* be collective if the VP describes a repeatable or reversible event (95)

(94)   Ana and Bob killed a person
        WIDE SCOPE INDEFINITE: there is a person that Ana and Bob killed: *collective*,
        because people typically cannot be killed more than once, so Ana and Bob must
        have worked together to kill the person
        NARROW SCOPE INDEFINITE: Ana killed a person and Bob killed a potentially
        different person: *distributive*, because we know that Ana killed a person, and
        we know that Bob killed a (presumably different) person

(95)   Ana and Bob cleaned a table
        WIDE SCOPE INDEFINITE: there is a table that Ana and Bob cleaned: *allows
        both interpretations*, because maybe they cleaned it together; or maybe Ana
        cleaned it and then later on, Bob cleaned it again
        NARROW SCOPE INDEFINITE: Ana cleaned a table and Bob cleaned a possibly
        different table: *distributive*, because we know that it is true that Ana cleaned
        a table, and Bob cleaned a table (whether or not it happens to be the same
        table)

(96)   Ana and Bob noticed a person
        WIDE SCOPE INDEFINITE: there is a person that Ana and Bob noticed: *distributive,* because Ana noticed that person, and Bob noticed that person
        NARROW SCOPE INDEFINITE: Ana noticed a person and Bob noticed a potentially different person: also *distributive*, because we know that Ana noticed a
        person; and Bob noticed a person

- Again, I don't think there is one objectively right way to code transitive verbs, but I decided to use singular indefinites because it allows us to distinguish reversibility from distributivity properties

Appendix 2

Intransitive verbs coded as 'collective' on their subject argument

['abound', 'aggregate', 'agree', 'amass', 'argue', 'banter', 'bargain', 'battle', 'bicker', 'brawl', 'bustle', 'clash', 'coexist', 'collaborate', 'collide', 'combat', 'commiserate', 'communicate', 'compete', 'concur', 'confabulate', 'conflict', 'congregate', 'consort', 'consult', 'convene', 'cooperate', 'correspond', 'court', 'cuddle', 'debate', 'decouple', 'dicker', 'differ', 'disagree', 'disconnect', 'disentangle', 'dispute', 'dissociate', 'distinguish', 'diverge', 'divide', 'divorce', 'duel', 'elope', 'embrace', 'feud', 'fight', 'flirt', 'flock', 'haggle', 'hobnob', 'huddle', 'hug', 'jest', 'joke', 'joust', 'meet', 'neck', 'negotiate', 'nuzzle', 'part', 'pet', 'quarrel', 'quibble', 'rendezvous', 'scuffle', 'skirmish', 'spar', 'spat', 'squabble', 'struggle', 'swarm', 'teem', 'throng', 'tilt', 'touch', 'tussel', 'vie', 'visit', 'war', 'wrangle', 'wrestle']

Intransitive verbs coded as 'either' on their subject argument

['advertise', 'appeal', 'burrow', 'chat', 'chitchat', 'confer', 'converse', 'delve', 'explain', 'forage', 'fumble', 'gossip', 'grope', 'kiss', 'leaf', 'matter', 'niggle', 'page', 'root', 'rummage', 'schmooze', 'scrabble', 'sound', 'thumb', 'tunnel', 'yak']

Intransitive verbs coded as 'distributive' on their subject argument

['December', 'ache', 'amble', 'antique', 'appear', 'arise', 'arrive', 'ascend', 'baa', 'babble', 'backpack', 'bake', 'barbecue', 'bawl', 'bay', 'beam', 'beep', 'belch', 'bellow', 'berry', 'bicycle', 'bike', 'billow', 'birdnest', 'bivouac', 'blackberry', 'blanch', 'blare', 'blast', 'blat', 'bleat', 'blink', 'blush', 'boat', 'bob', 'bobsled', 'boogie', 'boom', 'bop', 'bow', 'bowl', 'brag', 'braise', 'bray', 'breathe', 'bristle', 'brown', 'bubble', 'buck', 'bulge', 'burble', 'burn', 'burp', 'burr', 'buzz', 'cab', 'cackle', 'calve', 'cancan', 'canoe', 'canter', 'canvass', 'caravan', 'care', 'carol', 'carom', 'cascade', 'catnap', 'cavort', 'caw', 'chant', 'charbroil', 'charcoal-broil', 'chariot', 'chatter', 'cheep', 'chew', 'chime', 'chink', 'chir', 'chirp', 'chirrup', 'chitter', 'chomp', 'choreograph', 'chortle', 'chug', 'clack', 'clam', 'clamber', 'clang', 'clank', 'clap', 'clatter', 'clomp', 'cluck', 'clump', 'clunk', 'coast', 'coddle', 'color', 'come', 'complain', 'conduct', 'conga', 'convulse', 'cough', 'cower', 'crab', 'crack', 'crackle', 'crash', 'crayon', 'creak', 'creep', 'crepitate', 'cringe', 'croak', 'crochet', 'croon', 'crouch', 'crow', 'cry', 'cub', 'cuckoo', 'curtsey', 'cycle', 'dally', 'dance', 'dart',

'dawdle', 'dawn', 'delay', 'depart', 'depend', 'descend', 'die', 'din', 'ding',
'direct', 'disappear', 'dither', 'dodder', 'dogsled', 'doll', 'dong', 'doodle',
'doze', 'drawl', 'drift', 'drink', 'drone', 'drool', 'drowse', 'duck', 'dwell',
'eat', 'echo', 'eddy', 'effervesce', 'emanate', 'emerge', 'endure', 'ensue', 'erupt',
'escape', 'eventuate', 'exhale', 'exit', 'expire', 'explode', 'explore', 'exude',
'exult', 'faint', 'fawn', 'fester', 'fidget', 'film', 'fish', 'fizz', 'fizzle',
'flame', 'flee', 'flinch', 'flit', 'flop', 'floss', 'foal', 'foam', 'folat', 'fowl',
'foxtrot', 'fret', 'frolic', 'froth', 'frown', 'fume', 'gabble', 'gallop', 'gambol',
'gape', 'gasp', 'gawk', 'genuflect', 'gibber', 'giggle', 'glare', 'gleam', 'glimmer',
'glint', 'glisten', 'glitter', 'glow', 'glower', 'gnaw', 'go', 'gobble', 'goggle',
'gondola', 'goosestep', 'grieve', 'grimace', 'grin', 'gripe', 'groan', 'groom',
'grouch', 'grouse', 'growl', 'grumble', 'grunt', 'guffaw', 'gulp', 'gurgle', 'gush',
'gyrate', 'happen', 'hay', 'hee-haw', 'helicopter', 'hesitate', 'hiccup', 'hike',
'hiss', 'hobble', 'holiday', 'holler', 'honeymoon', 'honk', 'hoot', 'hover', 'howl',
'hum', 'hunt', 'hurry', 'hurtle', 'incandesce', 'inch', 'inhale', 'itch', 'jabber',
'jangle', 'jeep', 'jeer', 'jet', 'jig', 'jiggle', 'jingle', 'jitterbug', 'jive',
'jog', 'joggle', 'journey', 'jut', 'kayak', 'kitten', 'kneel', 'knell', 'knit',
'kvetch', 'lamb', 'languish', 'lapse', 'laugh', 'leak', 'leap', 'leer', 'lie',
'lilt', 'limp', 'linger', 'lisp', 'listen', 'log', 'loiter', 'loll', 'lollop',
'look', 'loom', 'lope', 'lounge', 'low', 'lumber', 'lurch', 'lurk', 'march', 'materializ
'meander', 'meow', 'mew', 'mind', 'moan', 'moo', 'moon', 'moped', 'mosey', 'motor',
'motorbike', 'motorcycle', 'mumble', 'munch', 'murmur', 'mushroom', 'mutter',
'nap', 'neigh', 'nest', 'nestle', 'nibble', 'nip', 'nod', 'nut', 'object', 'occur',
'ogle', 'oink', 'ooze', 'oscillate', 'overcharge', 'overnight', 'overspread',
'oyster', 'pant', 'parachute', 'parade', 'pearl', 'peek', 'peep', 'perambulate',
'perform', 'perish', 'persist', 'perspire', 'pipe', 'pirouette', 'play', 'plod',
'plop', 'point', 'polka', 'pop up', 'pout', 'prance', 'prawn', 'preach', 'predominate',
'prevail', 'prickle', 'proceed', 'project', 'promenade', 'protrude', 'pucker',
'puff', 'puke', 'pulsate', 'pup', 'purr', 'putter', 'quack', 'quake', 'quickstep',
'quit', 'quiver', 'rabbit', 'race', 'radiate', 'raft', 'rage', 'ramble', 'rasp',
'rattle', 'recede', 'recline', 'recoil', 'record', 'recur', 'reek', 'reel', 'rejoice',
'relax', 'remain', 'reside', 'resonate', 'resound', 'result', 'reverberate', 'revolve',
'rhapsodize', 'rickshaw', 'ride', 'roam', 'roar', 'roil', 'romp', 'roost', 'rotate',
'rove', 'rumba', 'rumble', 'rush', 'sag', 'salaam', 'samba', 'sashay', 'saunter',
'scamper', 'scintillate', 'scoot', 'scowl', 'scram', 'scrawk', 'scream', 'screech',
'scud', 'scurry', 'scutter', 'scuttle', 'seal', 'seep', 'seethe', 'shamble', 'shark',
'shed', 'shimmer', 'shiver', 'shout', 'show up', 'shriek', 'shrimp', 'shrink',
'shruf', 'shudder', 'sidle', 'sigh', 'simper', 'sing', 'sip', 'sit', 'skate',
'skateboard', 'skedaddle', 'sketch', 'ski', 'skip', 'skitter', 'skulk', 'sled',
'sledge', 'sleep', 'sleepwalk', 'sleigh', 'slink', 'slither', 'slog', 'slope',
'slouch', 'slumber', 'slump', 'slurp', 'smart', 'smell', 'smile', 'smirk', 'smoke',
'smolder', 'snap', 'snarl', 'sneeze', 'snicker', 'sniff', 'sniffle', 'snigger',
'snipe', 'snivel', 'snoop', 'snooze', 'snore', 'snort', 'snuffle', 'sob', 'sojourn',
'somersault', 'sparkle', 'speed', 'splutter', 'spout', 'sprawl', 'sprout', 'spruce',
'squall', 'squaredance', 'squat', 'squawk', 'squeak', 'squelch', 'squint', 'squirm',

'stammer', 'stare', 'stay', 'steam', 'stink', 'stomp', 'stoop', 'stop', 'straddle',
'straggle', 'stray', 'streak', 'stream', 'stride', 'stridulate', 'stroll', 'strut',
'stumble', 'stutter', 'summer', 'supervene', 'swagger', 'swallow', 'sway', 'sweat',
'swim', 'swing', 'swish', 'swoon', 'swoosh', 'tango', 'tapdance', 'tarry', 'taxi',
'teeter', 'throb', 'thrum', 'thud', 'thunder', 'thunk', 'tick', 'ting', 'tingle',
'tinkle', 'tiptoe', 'tisk', 'titter', 'toboggan', 'toddle', 'tog', 'toll', 'toot',
'tootle', 'totter', 'tower', 'traipse', 'tramp', 'transpire', 'travel', 'trek',
'tremble', 'trickle', 'trill', 'trolley', 'troop', 'trot', 'trudge', 'trumpet',
'trundle', 'turn up', 'twang', 'tweet', 'twinkle', 'twitter', 'ululate', 'undulate',
'vacation', 'vanish', 'vault', 'vomit', 'vroom', 'waddle', 'wade', 'waft', 'wag',
'wail', 'wait', 'walk', 'waltz', 'wander', 'warble', 'wave', 'waver', 'weave',
'weekend', 'weep', 'whale', 'wheeze', 'whelk', 'whelp', 'whimper', 'whine', 'whinny',
'whir', 'whish', 'whisper', 'whistle', 'whittle', 'whiz', 'whoop', 'whoosh', 'whump',
'wince', 'wink', 'winter', 'wobble', 'wonder', 'woof', 'wriggle', 'write', 'writhe',
'yacht', 'yammer', 'yap', 'yawn', 'yell', 'yelp', 'yip', 'yodel', 'yowl', 'zigzag',
'zing', 'zoom']

Transitive verbs coded as 'either' on their subject argument

['FedEx', 'French fry', 'UPS', 'abash', 'abate', 'abduct', 'absolve', 'abstract',
'abuse', 'accelerate', 'accept', 'acclaim', 'accumulate', 'acetify', 'acidify',
'acknowledge', 'acquire', 'acquit', 'add', 'address', 'adjudge', 'adjudicate',
'administer', 'admit', 'admonish', 'adopt', 'adorn', 'advance', 'advertise', 'advise',
'affect', 'affiliate', 'afflict', 'affront', 'age', 'agglomerate', 'aggravate',
'agitate', 'agonize', 'air', 'airmail', 'alarm', 'alert', 'alienate', 'alkalify',
'allocate', 'allot', 'allow', 'alter', 'alternate', 'amalgamate', 'amaze', 'ameliorate',
'americanize', 'amuse', 'analyze', 'anchor', 'anger', 'annihilate', 'annoint',
'announce', 'annoy', 'anoint', 'antagonize', 'appall', 'appease', 'append', 'applaud',
'applique', 'appoint', 'appraise', 'apprentice', 'appropriate', 'archive', 'arm',
'arouse', 'arrange', 'articulate', 'ask', 'asphalt', 'asphyxiate', 'assassinate',
'assemble', 'assert', 'assess', 'assign', 'associate', 'assuage', 'astonish',
'astound', 'atrophy', 'attach', 'attenuate', 'attire', 'audit', 'autograph', 'avow',
'awake', 'awaken', 'award', 'awe', 'backbite', 'baffle', 'bag', 'bail', 'bait',
'bake', 'balance', 'balk', 'balloon', 'band', 'bandage', 'bang', 'banish', 'bank',
'baptize', 'barbecue', 'barge', 'bark', 'barter', 'bash', 'baste', 'bat', 'bathe',
'batter', 'beach', 'beard', 'beat', 'bed', 'beget', 'begin', 'beguile', 'belt',
'bench', 'bend', 'bequeath', 'bereave', 'berth', 'bestrew', 'bet', 'bewilder',
'bewitch', 'bilk', 'bill', 'billet', 'billow', 'bind', 'birch', 'blab', 'blacken',
'blanket', 'blaze', 'bleed', 'blend', 'bless', 'blindfold', 'blister', 'blitz',
'block', 'bloom', 'bloq', 'blossom', 'blot', 'blow', 'bludgeon', 'blunt', 'blur',
'blurt', 'board', 'boast', 'boggle', 'boil', 'bolt', 'bombard', 'bond', 'bone',
'bonk', 'book', 'bore', 'borrow', 'boss', 'bother', 'bottle', 'bottlefeed', 'bounce',
'bound', 'box', 'bracket', 'brain', 'braise', 'brand', 'bread', 'break', 'breastfeed',
'brew', 'brick', 'bridge', 'bridle', 'brighten', 'bring', 'bristle', 'broaden',
'bronze', 'brown', 'bruise', 'brush', 'brushg', 'buckle', 'buff', 'buffet', 'bug',

'build', 'bulge', 'bully', 'bump', 'bundle', 'bunt', 'burdern', 'burgle', 'burl',
'burst', 'bus', 'butcher', 'butt', 'butter', 'button', 'buttonhole', 'buy', 'cable',
'caddy', 'cadge', 'cage', 'calcify', 'call', 'calm', 'calumniate', 'camouflage',
'camp', 'can', 'cane', 'canonize', 'canvass', 'cap', 'capsize', 'captain', 'captivate',
'capture', 'caramelize', 'carbonify', 'carbonize', 'carpet', 'carry', 'cart',
'carve', 'cascade', 'case', 'cash', 'cast', 'castigate', 'catapult', 'catch',
'caulk', 'cause', 'caution', 'cease', 'cede', 'cefang', 'celebrate', 'cellar',
'cement', 'censure', 'certify', 'chagrin', 'chain', 'chalk', 'champion', 'change',
'channel', 'chant', 'chaperone', 'char', 'characterize', 'charbroil', 'charcoal',
'charcoal-broil', 'charge', 'charm', 'charter', 'chasten', 'chastise', 'chauffeur',
'cheapen', 'cheat', 'check', 'cheer', 'chide', 'chill', 'chip', 'chisel', 'choke',
'choose', 'chop', 'choreograph', 'christen', 'chrome', 'chuck', 'churn', 'cite',
'clad', 'claim', 'clamp', 'class', 'classify', 'clean', 'cleanse', 'clear', 'clerk',
'climb', 'clip', 'cloak', 'clobber', 'clog', 'cloister', 'club', 'cluster', 'clutter',
'coach', 'coagulate', 'coalesce', 'coarsen', 'coat', 'coddle', 'coff', 'coil',
'coin', 'coincide', 'collapse', 'collate', 'collect', 'color', 'comb', 'combine',
'comfort', 'commence', 'commend', 'commingle', 'compare', 'compensate', 'compile',
'complete', 'compliment', 'compose', 'compress', 'compute', 'concatenate', 'conceal',
'concede', 'concern', 'concoct', 'condemn', 'condense', 'conduct', 'confederate',
'confess', 'confide', 'confirm', 'confiscate', 'confound', 'confuse', 'congratulate',
'conjoin', 'conk', 'connect', 'consecreate', 'console', 'consolidate', 'construct',
'consult', 'consume', 'contain', 'contaminate', 'content', 'continue', 'contract',
'contrast', 'contribute', 'convert', 'convey', 'convince', 'cook', 'cool', 'coop',
'cop', 'copy', 'core', 'cork', 'corral', 'correlate', 'corrode', 'corroe', 'cosh',
'counsel', 'count', 'court', 'cover', 'cow', 'cox', 'cram', 'crate', 'crayon',
'cream', 'crease', 'create', 'credit', 'crew', 'crimson', 'crinkle', 'cripple',
'crisp', 'criss-cross', 'criticize', 'crochet', 'crop', 'crowd', 'crown', 'crucify',
'cruise', 'crumble', 'crush', 'crystalize', 'cube', 'cuckold', 'cudgel', 'cull',
'cultivate', 'cure', 'curl', 'curry', 'curtain', 'cut', 'dab', 'dam', 'dampen',
'dance', 'dangle', 'dapple', 'darken', 'dash', 'date', 'daub', 'daunt', 'daze',
'dazzle', 'de-escalate', 'deaccent', 'debark', 'debone', 'debowel', 'debug', 'debur',
'decay', 'decelerate', 'decentralize', 'decimate', 'deck', 'declare', 'declaw',
'decline', 'decompose', 'decorate', 'decrease', 'decree', 'decry', 'deem', 'deep-fry',
'deepen', 'defame', 'defat', 'defeather', 'define', 'deflate', 'deflea', 'deflesh',
'defoam', 'defog', 'deforest', 'defraud', 'defrost', 'defuzz', 'degas', 'degenerate',
'degerm', 'deglaze', 'degrade', 'degrease', 'degrit', 'degum', 'degut', 'dehair',
'dehead', 'dehorn', 'dehull', 'dehumidify', 'dehusk', 'deice', 'deject', 'delete',
'delight', 'delint', 'deliver', 'delouse', 'deluge', 'deluster', 'demagnetize',
'demast', 'democratize', 'demolish', 'demonstrate', 'demoralize', 'denigrate',
'denounce', 'dent', 'denude', 'deny', 'deplete', 'depopulate', 'deport', 'deprecate',
'depreciate', 'depress', 'depressurize', 'deprive', 'derat', 'derib', 'deride',
'derind', 'derive', 'desalt', 'descale', 'describe', 'descry', 'desex', 'desiccate',
'design', 'designate', 'despoil', 'desprout', 'destabilize', 'destarch', 'destress',
'destroy', 'detach', 'detassel', 'detect', 'deteriorate', 'detonate', 'detusk',
'devastate', 'devein', 'develop', 'devour', 'dewater', 'dewax', 'deworm', 'diagnose',

'diaper', 'dice', 'dictate', 'dig', 'diminish', 'dip', 'direct', 'dirty', 'disabuse',
'disappoint', 'disarm', 'disassemble', 'disburse', 'discern', 'discharge', 'discombobula
'discomfit', 'discompose', 'disconcert', 'discontinue', 'discourage', 'discover',
'disencumber', 'disengage', 'disgorge', 'disgrace', 'disgruntle', 'disguise',
'disgust', 'dishearten', 'disillusion', 'disintegrate', 'dislodge', 'dismay',
'dismiss', 'disparage', 'dispatch', 'dispirit', 'displease', 'dispossess', 'disquiet',
'disrobe', 'dissatisfy', 'dissipate', 'dissolve', 'distemper', 'distend', 'distill',
'distract', 'distres', 'distribute', 'disturb', 'dive', 'divest', 'dock', 'doctor',
'doff', 'doll', 'dominate', 'don', 'donate', 'doodle', 'dot', 'double', 'douse',
'drag', 'drain', 'drape', 'draw', 'dredge', 'drench', 'dress', 'dribble', 'drill',
'drink', 'drip', 'drive', 'drizzle', 'drop', 'drown', 'drug', 'drum', 'dry', 'drydock',
'dub', 'dull', 'dumbfound', 'dump', 'dust', 'dye', 'earn', 'ease', 'eat', 'edge',
'effervesce', 'eject', 'elate', 'elect', 'electrify', 'electrocute', 'eliminate',
'email', 'emancipate', 'embarrass', 'embellish', 'embezzle', 'emblazon', 'embolden',
'emboss', 'embroider', 'emcee', 'employ', 'empty', 'emulsify', 'enamel', 'enchant',
'encircle', 'enclose', 'encourage', 'encrust', 'end', 'endorse', 'endow', 'energize',
'engage', 'engender', 'engrave', 'engross', 'enlarge', 'enlighten', 'enlist',
'enliven', 'enrage', 'enrapture', 'enrich', 'enroll', 'entangle', 'enter', 'entertain',
'enthrall', 'enthuse', 'entice', 'entrance', 'entroduce', 'entrust', 'entwine',
'envisage', 'epoxy', 'equalize', 'equip', 'eradicate', 'erase', 'erode', 'escort',
'espy', 'establish', 'estimate', 'etch', 'eulogize', 'evacuate', 'evaluate', 'evaporate'
'even', 'evict', 'evolve', 'exact', 'examine', 'exasperate', 'excavate', 'exchange',
'excise', 'excite', 'excommunicate', 'excuse', 'execute', 'exercise', 'exhaust',
'exhilrate', 'exonerate', 'exorcise', 'expand', 'expel', 'explain', 'explicate',
'explore', 'express', 'expunge', 'extend', 'exterminate', 'extirpate', 'extol',
'extort', 'extract', 'extradite', 'extrude', 'fabricate', 'face', 'fade', 'fall',
'fascinate', 'fash', 'fashion', 'fasten', 'fatten', 'fault', 'fax', 'faze', 'feather',
'federate', 'feed', 'felicitate', 'fence', 'ferment', 'ferret', 'ferry', 'fester',
'festoon', 'fetch', 'fetter', 'filch', 'file', 'fill', 'fillet', 'film', 'filter',
'find', 'fine', 'finish', 'fire', 'firm', 'fix', 'flabberghast', 'flare', 'flatten',
'flatter', 'fleck', 'fleece', 'flick', 'flicker', 'fling', 'flip', 'float', 'flog',
'flood', 'floor', 'flour', 'flower', 'fluctuate', 'flush', 'fluster', 'fly', 'fold',
'forcefeed', 'forest', 'forfeit', 'forge', 'forgive', 'fork', 'form', 'forward',
'fossilize', 'frame', 'fray', 'free', 'freeze', 'freshen', 'frighten', 'frisk',
'frost', 'froth', 'fructify', 'frustrate', 'fry', 'fuel', 'funnel', 'furnish',
'fuse', 'gag', 'gain', 'gall', 'galvanize', 'garage', 'garb', 'garland', 'garnish',
'garrotte', 'gasify', 'gather', 'gelatinize', 'generate', 'germinate', 'get',
'gill', 'give', 'gladden', 'glaze', 'glide', 'glimpse', 'glom', 'glove', 'glue',
'glutenize', 'gouge', 'grab', 'graffiti', 'graft', 'grant', 'granulate', 'grate',
'gratify', 'gravel', 'gray', 'grease', 'green', 'greet', 'grieve', 'grill', 'grind',
'grip', 'groom', 'groove', 'ground', 'group', 'grow', 'guarantee', 'guard', 'guide',
'gull', 'gulp', 'gum', 'gut', 'guzzle', 'hack', 'hail', 'halt', 'halter', 'hammer',
'hand', 'handcuff', 'handfeed', 'handle', 'hang', 'hangar', 'harass', 'hardboil',
'harden', 'harmonize', 'harness', 'hasten', 'hatch', 'haul', 'haunt', 'head',
'heal', 'heap', 'hearten', 'heat', 'heave', 'heel', 'heft', 'heighten', 'herald',

'herd', 'hew', 'hide', 'hinge', 'hire', 'hit', 'hitch', 'hoard', 'hoist', 'hold',
'honor', 'hook', 'hoover', 'horrify', 'hose', 'host', 'house', 'hull', 'hum',
'humble', 'humidify', 'humiliate', 'hunt', 'hurl', 'hurt', 'hush', 'husk', 'hybridize',
'hypnotize', 'identify', 'ignite', 'illuminate', 'illustrate', 'imbibe', 'imbue',
'immerse', 'immolate', 'impeach', 'impound', 'impregnate', 'impress', 'imprint',
'improve', 'incense', 'incise', 'incorporate', 'increase', 'incubate', 'induct',
'infect', 'inflate', 'infuriate', 'ingest', 'inherit', 'initial', 'initiate',
'inject', 'ink', 'inlay', 'inscribe', 'inspect', 'inspire', 'install', 'instruct',
'insult', 'integrate', 'intensify', 'interchange', 'interconnect', 'interest',
'interlaace', 'interlace', 'interlard', 'interleave', 'interlink', 'interlock',
'intermingle', 'interrelate', 'intersperse', 'intertwine', 'interweave', 'intimidate',
'intone', 'intoxicate', 'intrigue', 'intrude', 'inundate', 'invent', 'invest',
'investigate', 'invigorate', 'iodize', 'ionize', 'irk', 'iron', 'irritate', 'isolate',
'issue', 'jab', 'jail', 'jam', 'japan', 'jar', 'jerk', 'join', 'jollify', 'jolt',
'judge', 'jug', 'jumble', 'jump', 'keep', 'kennel', 'kick', 'kidnap', 'kill',
'kindle', 'knead', 'knife', 'knight', 'knit', 'knock', 'knot', 'kuck', 'label',
'lace', 'lacquer', 'ladle', 'lambaste', 'lampoon', 'land', 'lard', 'lash', 'lasso',
'last', 'latch', 'lather', 'laud', 'lay', 'leach', 'lead', 'lean', 'lease', 'leash',
'leave', 'leaven', 'lend', 'lengthen', 'lessen', 'letter', 'level', 'levitate',
'liberate', 'lick', 'lift', 'light', 'lighten', 'lignify', 'line', 'link', 'lint',
'lipstick', 'liquefy', 'liquidate', 'listen', 'litter', 'load', 'loan', 'lob',
'lock', 'lodge', 'loft', 'loop', 'loose', 'loosen', 'lop', 'louse', 'lower', 'lug',
'lull', 'lump', 'macerate', 'madden', 'magnetize', 'magnify', 'mail', 'maintain',
'make', 'malign', 'manacle', 'mangle', 'manicure', 'manifest', 'mantle', 'manufacture',
'mark', 'marry', 'martyr', 'mash', 'mask', 'mass', 'massacre', 'mate', 'mature',
'mellow', 'melt', 'mention', 'merge', 'mesmerize', 'metamorphose', 'microfilm',
'microwave', 'miff', 'milk', 'mince', 'mine', 'mingle', 'mint', 'mix', 'mock',
'model', 'modem', 'moisten', 'mold', 'molder', 'mollify', 'molt', 'monogram',
'moor', 'mop', 'mortify', 'mother', 'mottle', 'mound', 'mount', 'move', 'mow',
'muddle', 'muddy', 'mulch', 'mulct', 'multiply', 'murder', 'muzzle', 'mystify',
'nab', 'nail', 'name', 'narrate', 'narrow', 'nauseate', 'neaten', 'netmail', 'nettle',
'network', 'neutralize', 'nick', 'nickel', 'nickname', 'nitrify', 'nominate',
'nose', 'notch', 'nudge', 'numb', 'nurse', 'oar', 'obliterate', 'obsess', 'obtain',
'offend', 'offer', 'oil', 'omit', 'open', 'operate', 'oppose', 'ordain', 'order',
'organize', 'ornament', 'orphan', 'ossify', 'ostracize', 'oust', 'outlaw', 'outrage',
'oven-fry', 'oven-poach', 'overawe', 'overcharge', 'overcook', 'overturn', 'overwhelm',
'owe', 'oxidize', 'pacify', 'pack', 'package', 'pad', 'paddle', 'paddywhack',
'padlock', 'pain', 'paint', 'pair', 'pale', 'pan-broil', 'pan-fry', 'panel', 'paper',
'parboil', 'parch', 'pardon', 'parquet', 'partition', 'partner', 'pass', 'paste',
'pasture', 'pat', 'patch', 'patrol', 'pauper', 'pave', 'pay', 'pedal', 'peddle',
'peel', 'peeve', 'peg', 'pelt', 'pen', 'penalize', 'pencil', 'pepper', 'perch',
'percolate', 'perforate', 'perform', 'perfume', 'perk', 'perplex', 'persecute',
'perturb', 'petrify', 'phone', 'photocopy', 'photograph', 'pick', 'pierce', 'pile',
'pilfer', 'pillory', 'pilot', 'pinch', 'pinion', 'pioneer', 'pip', 'pique', 'pirate',
'pit', 'pitch', 'pith', 'placate', 'place', 'plagiarize', 'plague', 'plank', 'plant',

'plaster', 'plate', 'play', 'please', 'plot', 'plow', 'pluck', 'plug', 'plumb',
'plumet', 'plunder', 'plunge', 'ply', 'poach', 'pocket', 'pod', 'poison', 'poke',
'polarize', 'police', 'polish', 'poll', 'pollute', 'pomade', 'pool', 'pop', 'port',
'portray', 'position', 'post', 'poster', 'postmark', 'pot', 'pot-roast', 'pound',
'pour', 'powder', 'praise', 'preach', 'preen', 'preoccupy', 'prepare', 'present',
'press', 'price', 'prick', 'primp', 'prine', 'print', 'probe', 'proclaim', 'procure',
'prod', 'produce', 'profess', 'proffer', 'proliferate', 'promise', 'pronounce',
'propagate', 'propose', 'prosecute', 'prospect', 'prove', 'provide', 'provoke',
'prowl', 'prune', 'pry', 'pull', 'pulp', 'pulverize', 'pummel', 'pump', 'punish',
'punt', 'purchase', 'purge', 'purify', 'purloin', 'purple', 'push', 'put', 'putrefy',
'putty', 'puzzle', 'quadruple', 'quaff', 'qualify', 'quarantine', 'quarry', 'quicken',
'quiet', 'quieten', 'quiz', 'quote', 'radio', 'raid', 'raise', 'rake', 'ram',
'rank', 'rankle', 'ransack', 'rap', 'rate', 'ravage', 'raze', 'reach', 'read',
'reap', 'reassure', 'rebuke', 'recall', 'receive', 'recite', 'reclaim', 'recollect',
'recommend', 'recompense', 'record', 'recount', 'recover', 'recreate', 'recruit',
'redden', 'redeem', 'refer', 'referee', 'refresh', 'refund', 'regain', 'regale',
'regularize', 'reimburse', 'reinstate', 'reiterate', 'reject', 'rekindle', 'relate',
'relax', 'relay', 'relieve', 'relinquish', 'remark', 'remit', 'remove', 'render',
'rent', 'renumerate', 'reopen', 'repay', 'repeat', 'repel', 'replenish', 'repopulate',
'report', 'repossess', 'reprach', 'represent', 'reprimand', 'reproduce', 'reprove',
'repudiate', 'repulse', 'repute', 'rescue', 'reserve', 'rest', 'restore', 'resume',
'retrieve', 'return', 'reveal', 'review', 'revile', 'revitalize', 'revolt', 'reward',
'rhyme', 'rid', 'riddle', 'ridicule', 'riffle', 'rifle', 'rile', 'rim', 'rind',
'ring', 'rinse', 'rip', 'ripen', 'ripple', 'rise', 'rissole', 'rivet', 'roast',
'rob', 'robe', 'rocket', 'roil', 'roll', 'roof', 'rope', 'rosin', 'rot', 'rouge',
'roughen', 'round', 'row', 'rub', 'ruffle', 'ruin', 'rule', 'run', 'rust', 'rustle',
'rut', 'sacrifice', 'sadden', 'saddle', 'sail', 'salt', 'salute', 'salve', 'sand',
'sandpaper', 'sap', 'satellite', 'satisfy', 'saturate', 'saute', 'save', 'saw',
'say', 'scale', 'scallop', 'scalp', 'scan', 'scandalize', 'scare', 'scatter',
'scavenge', 'schlep', 'scold', 'scoop', 'scorch', 'scorn', 'scour', 'scout', 'scramble',
'scrape', 'scratch', 'scrawl', 'screen', 'screw', 'scribble', 'scrounge', 'scrub',
'scrutinize', 'sculpt', 'sear', 'search', 'season', 'seclude', 'secure', 'seed',
'seek', 'seethe', 'segregate', 'seize', 'select', 'sell', 'sempahore', 'send',
'separate', 'seq', 'sequester', 'serve', 'set', 'settle', 'sever', 'sew', 'shackle',
'shake', 'shame', 'shape', 'sharpen', 'shatter', 'shave', 'shear', 'sheathe',
'shell', 'shellac', 'shelter', 'shelve', 'shepherd', 'shift', 'shine', 'ship',
'shirr', 'shock', 'shoo', 'shoot', 'shop', 'short', 'short-circuit', 'shorten',
'shoulder', 'shove', 'shovel', 'show', 'shower', 'shred', 'shrivel', 'shroud',
'shuck', 'shuffle', 'shunt', 'shut', 'shuttle', 'sicken', 'sift', 'sign', 'signal',
'silicify', 'silkscreen', 'silver', 'simmer', 'sing', 'singe', 'sink', 'siphon',
'situate', 'sketch', 'skewer', 'skim', 'skin', 'skipper', 'skyrocket', 'slack',
'slacken', 'slam', 'slap', 'slash', 'slather', 'slaughter', 'slay', 'slice', 'slide',
'slim', 'sling', 'slip', 'slit', 'slop', 'slosh', 'slow', 'slug', 'smack', 'smarten',
'smash', 'smear', 'smoke', 'smolder', 'smooth', 'smother', 'smudge', 'smuggle',
'snail', 'snare', 'snatch', 'sneak', 'snip', 'snub', 'soak', 'soap', 'soar', 'sober',

'sock', 'softboil', 'soften', 'soil', 'solace', 'solder', 'solidify', 'soothe',
'sour', 'sow', 'span', 'spank', 'spare', 'spatter', 'spawn', 'spear', 'speckle',
'spellbind', 'spew', 'spill', 'spin', 'spindle', 'spit', 'splash', 'splatter',
'splay', 'splice', 'splinter', 'splip', 'split', 'splotch', 'sponge', 'sponsor',
'spook', 'spool', 'spoon', 'spoonfeed', 'spot', 'spray', 'spraypaint', 'spread',
'sprinkle', 'spritz', 'spruce', 'spurt', 'spy', 'squash', 'squeeze', 'squirt',
'squish', 'stab', 'stabilize', 'stable', 'stack', 'staff', 'stagger', 'stagnate',
'stain', 'stalk', 'stamp', 'stand', 'staple', 'star', 'starch', 'start', 'startle',
'stash', 'state', 'steady', 'steal', 'steam-bake', 'steep', 'steepen', 'stem',
'stencil', 'stew', 'stick', 'stiffen', 'stifle', 'stigmatize', 'stimulate', 'sting',
'stipple', 'stir', 'stir-fry', 'stitch', 'stock', 'stone', 'stop up', 'stopper',
'store', 'stow', 'straighten', 'strain', 'strangle', 'strap', 'stratify', 'strengthen',
'stress', 'strew', 'strike', 'string', 'strip', 'stroke', 'stucco', 'stud', 'study',
'stump', 'stun', 'stupefy', 'style', 'submerge', 'submit', 'subside', 'substitute',
'subtract', 'suck', 'suction', 'suffocate', 'suffuse', 'sugar', 'suggest', 'sulphur',
'sunder', 'supply', 'surge', 'surprise', 'surrender', 'surround', 'survey', 'suspend',
'swab', 'swaddle', 'swallow', 'swap', 'swat', 'swathe', 'sweep', 'sweeten', 'swell',
'swig', 'swill', 'swindle', 'swipe', 'swirl', 'synthesize', 'tack', 'tag', 'tail',
'tailor', 'taint', 'take', 'talc', 'tame', 'tamp', 'tan', 'tantalize', 'tap',
'tape', 'taper', 'tar', 'tarmac', 'tarnish', 'tassel', 'tattoo', 'tauten', 'tax',
'teach', 'team', 'tear', 'tease', 'telecast', 'telegraph', 'telephone', 'televise',
'tell', 'tempt', 'tense', 'term', 'terminate', 'terrify', 'terrorize', 'tether',
'thank', 'thatch', 'thaw', 'thicken', 'thieve', 'thin', 'thrach', 'threaten',
'thrill', 'throw', 'thrust', 'thumbtack', 'thump', 'thwack', 'ticket', 'tickle',
'tie', 'tighten', 'tile', 'tin', 'tint', 'tip', 'tire', 'titillate', 'toast',
'tog', 'top', 'topple', 'torment', 'toss', 'total', 'tote', 'toughen', 'tow',
'towel', 'trace', 'track', 'trade', 'train', 'trammel', 'transcribe', 'transfer',
'transform', 'transmute', 'transport', 'trap', 'trawl', 'treat', 'tree', 'trickle',
'trim', 'triple', 'troll', 'trouble', 'truck', 'truncheon', 'trust', 'try', 'tuck',
'tug', 'tumble', 'turf', 'turn', 'tutor', 'twinkle', 'twirl', 'twist', 'type',
'ulcerate', 'umpire', 'unbolt', 'unbuckle', 'unburden', 'unbutton', 'unchain',
'unclamp', 'unclasp', 'unclip', 'undercharge', 'understudy', 'undress', 'unfasten',
'unfold', 'unglue', 'unhinge', 'unhitch', 'unhook', 'unify', 'unionize', 'unite',
'unlace', 'unlatch', 'unleash', 'unlock', 'unnerve', 'unpeg', 'unpin', 'unscrew',
'unsettle', 'unshackle', 'unstaple', 'unstitch', 'untie', 'unzip', 'upbraid',
'uplift', 'uproot', 'upset', 'use', 'usher', 'vacuum', 'valet', 'vaporize', 'varnish',
'vary', 'veil', 'vein', 'veneer', 'vex', 'vibrate', 'victimize', 'vilify', 'vitrify',
'void', 'volatilize', 'volunteer', 'vote', 'wad', 'wager', 'waken', 'wallop',
'wallpaper', 'wangle', 'warehouse', 'warm', 'warn', 'warp', 'warrant', 'wash',
'waste', 'water', 'wax', 'weaken', 'wean', 'wear', 'weary', 'weasel', 'weave',
'wed', 'wedge', 'weed', 'welcome', 'weld', 'westernize', 'whack', 'wheel', 'whip',
'whirl', 'whisk', 'whistle', 'whiten', 'whitewash', 'whittle', 'widen', 'widow',
'wield', 'will', 'wilt', 'win', 'wind', 'winkle', 'winnow', 'wipe', 'wire', 'wireless',
'withdraw', 'wither', 'witness', 'wolf', 'work', 'worm', 'worry', 'worsen', 'wound',
'wow', 'wrap', 'wreathe', 'wreck', 'wrench', 'wrest', 'wring', 'write', 'yank',

'yellow', 'yield', 'yoke', 'zest', 'zip', 'zipcode']

Transitive verbs coded as 'distributive' on their subject argument

['abandon', 'abhor', 'abut', 'accompany', 'adhere', 'adjoin', 'admire', 'adore',
'appreciate', 'arch', 'assume', 'avoid', 'bare', 'battle', 'believe', 'bite',
'border', 'boycott', 'caress', 'chase', 'cherish', 'chew', 'chomp', 'clasp', 'claw',
'cleave', 'clench', 'click', 'cling', 'close', 'clutch', 'cock', 'consider', 'covet',
'crane', 'crave', 'crook', 'cross', 'crunch', 'cuddle', 'debate', 'deplore', 'desert',
'desire', 'despise', 'disdain', 'dislike', 'distrust', 'dodge', 'dread', 'duck',
'elude', 'embrace', 'enjoy', 'envy', 'esteem', 'evade', 'exalt', 'execrate', 'eye',
'fancy', 'favor', 'fear', 'feel', 'fight', 'figure', 'flank', 'flap', 'flash',
'flex', 'flutter', 'follow', 'fracture', 'gape', 'gawk', 'gaze', 'glance', 'glare',
'gnash', 'gnaw', 'goggle', 'grasp', 'graze', 'guess', 'hanker', 'hate', 'hear',
'hug', 'hunch', 'idolize', 'imagine', 'injure', 'intersect', 'kiss', 'know', 'lament',
'leer', 'like', 'loathe', 'look', 'love', 'lust', 'mean', 'meet', 'miss', 'mourn',
'munch', 'need', 'nibble', 'note', 'notice', 'nuzzle', 'observe', 'ogle', 'overhang',
'overhear', 'paw', 'peck', 'peek', 'peep', 'perceive', 'pet', 'pity', 'precede',
'presume', 'prize', 'punch', 'pursue', 'quit', 'reckon', 'recognize', 'regard',
'regret', 'relish', 'remember', 'resent', 'respect', 'revere', 'ride', 'rue',
'rupture', 'savor', 'scald', 'scent', 'see', 'sense', 'shadow', 'shun', 'sidestep',
'sight', 'sip', 'skirt', 'slurp', 'smell', 'sniff', 'snoop', 'sprain', 'squint',
'stare', 'stretch', 'stub', 'support', 'suppose', 'surmount', 'suspect', 'taste',
'think', 'thirst', 'tolerate', 'touch', 'trail', 'treasure', 'underlie', 'value',
'venerate', 'view', 'visit', 'visualize', 'want', 'watch', 'worship', 'yearn']

Transitive verbs coded as 'either' on their object argument

['add', 'affiliate', 'alternate', 'amalgamate', 'arm', 'associate', 'barter',
'blend', 'burdern', 'change', 'charge', 'coalesce', 'coincide', 'combine', 'commingle',
'compare', 'compensate', 'concatenate', 'confederate', 'confuse', 'conjoin', 'connect',
'consolidate', 'contrast', 'correlate', 'cream', 'credit', 'criss-cross', 'decouple',
'differentiate', 'disconnect', 'disentangle', 'dissociate', 'distinguish', 'divide',
'divorce', 'engage', 'entroduce', 'entrust', 'entwine', 'equip', 'exchange', 'furnish',
'fuse', 'harmonize', 'incorporate', 'integrate', 'interchange', 'interconnect',
'interlaace', 'interlink', 'interlock', 'intermingle', 'interrelate', 'intertwine',
'invest', 'join', 'link', 'marry', 'mate', 'merge', 'mingle', 'mix', 'muddle',
'network', 'oppose', 'pair', 'part', 'ply', 'pool', 'present', 'provide', 'regale',
'reward', 'rhyme', 'segregate', 'substitute', 'supply', 'swap', 'team', 'total',
'trust', 'unify', 'unite', 'wed']

Transitive verbs coded as 'distributive' on their object argument

['FedEx', 'French fry', 'UPS', 'abandon', 'abash', 'abate', 'abduct', 'abhor',
'absolve', 'abstract', 'abuse', 'abut', 'accelerate', 'accept', 'acclaim', 'accompany',

'accumulate', 'acetify', 'acidify', 'acquire', 'acquit', 'address', 'adhere',
'administer', 'admire', 'admonish', 'adore', 'adorn', 'advance', 'advertise',
'advise', 'affect', 'afflict', 'affront', 'age', 'agglomerate', 'aggravate', 'agitate',
'agonize', 'agree', 'air', 'airmail', 'alarm', 'alert', 'alienate', 'alkalify',
'allocate', 'allot', 'amaze', 'ameliorate', 'americanize', 'amuse', 'analyze',
'anchor', 'anger', 'annihilate', 'annoint', 'announce', 'annoy', 'anoint', 'antagonize',
'appall', 'appease', 'append', 'applaud', 'applique', 'apprentice', 'appropriate',
'arch', 'archive', 'argue', 'arouse', 'arrange', 'articulate', 'ask', 'asphalt',
'asphyxiate', 'assassinate', 'assemble', 'assess', 'assign', 'assuage', 'astonish',
'astound', 'atrophy', 'attach', 'attenuate', 'audit', 'autograph', 'avoid', 'awake',
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'war', 'warehouse', 'warm', 'warn', 'warp', 'wash', 'waste', 'watch', 'water',
'wax', 'weaken', 'wean', 'wear', 'weary', 'weasel', 'weave', 'wedge', 'weed',
'welcome', 'weld', 'westernize', 'whack', 'wheel', 'whip', 'whirl', 'whisk', 'whistle',
'whiten', 'whitewash', 'whittle', 'widen', 'widow', 'wield', 'wiggle', 'will',
'wilt', 'win', 'wind', 'winkle', 'winnow', 'wipe', 'wire', 'wireless', 'withdraw',
'wither', 'witness', 'wolf', 'wonder', 'worm', 'worry', 'worsen', 'worship', 'wound',
'wow', 'wrangle', 'wrap', 'wreathe', 'wreck', 'wrench', 'wrest', 'wrestle', 'wring',
'wrinkle', 'write', 'yank', 'yearn', 'yellow', 'yield', 'yoke', 'zest', 'zip',
'zipcode']