Tracking down phrasal verbs: the case of UP and DOWN

Andreea Rosca & Yvonne Baker de Altamirano
Definition


“…linguists and grammarians struggle with nuances of phrasal verb definitions.”

A phrasal verb is any two-part verb “consisting of a lexical verb …proper…followed by an adverbial particle that is either contiguous… to that verb or noncontiguous”


“A phrasal verb is a combination of an ordinary verb and a preposition or an adverbial particle that has at least one particular meaning that is not predictable from the combined literal meanings of the verb and the preposition or particle.”
RESEARCH

• Aims

To look at the frequency, meaning and use of phrasal verbs and determine how to go about facilitating their understanding, acquisition and generation by L2 learners

UP = most recurrent particle in English
DOWN ranked much further down the list – 4th or 5th

in a criminal context

building on the work of McCarthy & O’Dell (2004)
*English Phrasal Verbs in Use Intermediate* (Professional English in Use)

enlarging the scope from purely criminal actions
to include police investigative work
Tracking down phrasal verbs: the case of UP and DOWN

RESEARCH

• Corpus

Spoken dialogues taken from the script of the American TV series Castle shown on ABC since 2009

Corpus was stripped of stage directions, character names, and all incidental language, leaving a total of 504,124 words of running text.

Phrasal verbs with UP and DOWN were located and divided into two categories:
1. Related to the context of crime (520 tokens for ‘up’; 299 for ‘down’)
2. Unrelated to the context of crime (880 tokens for ‘up’; 127 for ‘down’)

NB the same PV may be classified in either group depending on the nature of the affected entity e.g. clean up (dishes or dirt i.e. evidence of a crime)
Tracking down phrasal verbs: the case of UP and DOWN
Tracking down phrasal verbs: the case of UP and DOWN

- **UP**
  - Moving from a higher to a lower place
  - Stand up
  - Put your hands up

- **DOWN**
  - Moving from a lower to a higher place
  - Sit down
  - Get down

**PROTOTYPICAL MEANING**

- **NB.** Cognitive motivation of particle

= BASIC CONCEPT
Reasons for notoriety

1. Existence of multiple meanings (polysemy)

Gardner & Davies (2007: 353): the 100 most frequent PVs each had an average of 5.6 different meanings

Our corpus: *pick up* (2nd most frequent PV in both our corpus and on Garnier & Schmitt’s (2014) PHaVE list) has four (or possibly five) different senses
Tracking down phrasal verbs: the case of UP and DOWN

1. Stop and take someone to a police station to question or arrest them
2. Collect something, usually in an illegal transaction
3. Make a place clean and tidy
4. Notice a smell or sound, or that someone/something is present
5. Capture on film

I sent Roger to make the drop and pick up the passports.

Dogs picked up a scent and traced it to the cemetery.

Police picked him up for charges of disorderly conduct.

It takes real presence of mind to put five bullets into a man’s chest and then keep cool long enough to pick up after yourself.

Cam never picks her up again.
Tracking down phrasal verbs: the case of UP and DOWN

Reasons for notoriety
1. Existence of multiple meanings (polysemy)

Moving from a lower to a higher place

PROTOTYPICAL MEANING

FIGURATIVE MEANING

Tyler & Evans, 2002
Dirven, 2002
Rudzka-Ostyn, 2003

Picked up the passports
Picked up the scent
Cam picked her up

Whatever the complaint is, I’m gonna need the two of you to pick it up first thing in the morning.
Reasons for notoriety

2. Structural and syntactic complexity

• transitive / intransitive dichotomy

Cam never picks her up again.

...pick up after yourself
Reasons for notoriety

2. Structural and syntactic complexity

• transitive / intransitive dichotomy

Cam never picks her up again. ...pick up after yourself

Pick up the passports
Reasons for notoriety

2. Structural and syntactic complexity

• transitive / intransitive dichotomy

Cam never picks her up again. ...pick up after yourself

Pick the passports up
Reasons for notoriety

2. Structural and syntactic complexity

- transitive / intransitive dichotomy

Cam never *picks her up* again.  

...*pick up* after yourself

*Pick the passports up* = post-DO position

*Pick up the passports* = post-verb position

Dirven (2001):
degree of consciousness:
1. discourse context > new info at end
2. entrenchment principle > referent / collocate

Gries (1997, 1999)
Tracking down phrasal verbs: the case of UP and DOWN

Reasons for notoriety

2. Structural and syntactic complexity

• transitive

Cam never picks her up again.

Pick the passports up = post-DO position

Pick up the passports = post-verb position

• 3-part verbs

Crack down on the ecstasy dealers = post-verb position

Gries (1997, 1999)
Tracking down phrasal verbs: the case of UP and DOWN

Reasons for notoriety

2. Structural and syntactic complexity

- transitive

Cam never **picks her up** again.

**Pick the passports up**

**Pick up the passports**

- 3-part verbs

**Crack down on the ecstasy dealers**

Gries (1997, 1999)

• transitive = post-DO position

• 3-part verbs = post-verb position

• preposition = post-adverbial particle
Tracking down phrasal verbs: the case of UP and DOWN

Reasons for notoriety

2. Structural and syntactic complexity

Can you drive up it?

Can you drive it up it?

Can you drive it up?
Tracking down phrasal verbs: the case of UP and DOWN

Reasons for notoriety

3. Ubiquity of PVs
4. Cross-linguistic differences

“learners will encounter, on average, one PV in every 150 words of English they are exposed to”
Reasons for notoriety

3. Ubiquity of PVs

Bolinger (1971):
Native speakers can create new PVs with ease.

http://www.macmillandictionaries.com/MED-Magazine/April2005

‘to sex something up’ (2003) (make it more interesting/significant)
>> ‘to sex something down’ (2005) (less interesting/exciting)

Our corpus:
Well, the Casillases lawyered up. He’s already trying to suppress her confession.

NYPD Blues - 1993
Reasons for notoriety

4. Poor textbook presentation

Researchers...

Biber & Reppen, 2002: 200
Our approach

• Cognitive perspective

based on Rudzka-Ostyn, 2003:

meaning extensions for particles UP and DOWN

from literal to metaphorical

> networks of related senses

+ visual imagery

+ mental generalisation based on linguistic input

>>>> facilitates comprehension + retention of PVs
Tracking down phrasal verbs: the case of UP and DOWN

**RESEARCH**

- **Analytical tools**

RESEARCH

• Findings

128 lexical-verb types for both UP and DOWN:

94 lexical-verb types for UP

34 lexical-verb types for DOWN
Tracking down phrasal verbs: the case of **UP** and **DOWN**

**RESEARCH**

- **Findings – frequency of UP**

<table>
<thead>
<tr>
<th>Rank</th>
<th>PVs (with ‘up’)</th>
<th>Raw frequency</th>
<th>% of all PVs with ‘up’ in the corpus</th>
<th>Cumulative %</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>end</td>
<td>57</td>
<td>10.98</td>
<td>10.98</td>
</tr>
<tr>
<td>2</td>
<td>pick</td>
<td>49</td>
<td>9.44</td>
<td>20.42</td>
</tr>
<tr>
<td>3</td>
<td>come</td>
<td>32</td>
<td>6.16</td>
<td>26.58</td>
</tr>
<tr>
<td>4</td>
<td>set</td>
<td>26</td>
<td>5.00</td>
<td>31.59</td>
</tr>
<tr>
<td>5</td>
<td>turn</td>
<td>19</td>
<td>3.66</td>
<td>35.26</td>
</tr>
<tr>
<td>6</td>
<td>clean</td>
<td>17</td>
<td>3.27</td>
<td>38.53</td>
</tr>
<tr>
<td>7</td>
<td>cover</td>
<td>17</td>
<td>3.27</td>
<td>41.81</td>
</tr>
<tr>
<td>8</td>
<td>dig</td>
<td>17</td>
<td>3.27</td>
<td>45.08</td>
</tr>
<tr>
<td>9</td>
<td>open</td>
<td>17</td>
<td>3.27</td>
<td>48.36</td>
</tr>
<tr>
<td>10</td>
<td>give</td>
<td>16</td>
<td>3.08</td>
<td>51.44</td>
</tr>
<tr>
<td>11</td>
<td>make</td>
<td>15</td>
<td>2.89</td>
<td>54.33</td>
</tr>
<tr>
<td>12</td>
<td>follow</td>
<td>14</td>
<td>2.69</td>
<td>57.03</td>
</tr>
<tr>
<td>13</td>
<td>blow</td>
<td>12</td>
<td>2.31</td>
<td>59.34</td>
</tr>
<tr>
<td>14</td>
<td>pull</td>
<td>11</td>
<td>2.11</td>
<td>61.46</td>
</tr>
<tr>
<td>15</td>
<td>beat</td>
<td>10</td>
<td>1.92</td>
<td>63.39</td>
</tr>
<tr>
<td>16</td>
<td>lock</td>
<td>10</td>
<td>1.92</td>
<td>65.31</td>
</tr>
<tr>
<td>17</td>
<td>put</td>
<td>9</td>
<td>1.73</td>
<td>67.05</td>
</tr>
<tr>
<td>18</td>
<td>back</td>
<td>7</td>
<td>1.34</td>
<td>68.40</td>
</tr>
<tr>
<td>19</td>
<td>lawyer</td>
<td>7</td>
<td>1.34</td>
<td>69.74</td>
</tr>
<tr>
<td>20</td>
<td>look</td>
<td>7</td>
<td>1.34</td>
<td>71.09</td>
</tr>
<tr>
<td>21</td>
<td>write</td>
<td>7</td>
<td>1.34</td>
<td>72.44</td>
</tr>
<tr>
<td>22</td>
<td>break</td>
<td>6</td>
<td>1.15</td>
<td>73.60</td>
</tr>
<tr>
<td>23</td>
<td>get</td>
<td>6</td>
<td>1.15</td>
<td>74.75</td>
</tr>
<tr>
<td>24</td>
<td>mess</td>
<td>6</td>
<td>1.15</td>
<td>75.91</td>
</tr>
<tr>
<td>25</td>
<td>wind</td>
<td>6</td>
<td>1.15</td>
<td>77.07</td>
</tr>
</tbody>
</table>
### Tracking down phrasal verbs: the case of UP and DOWN

#### RESEARCH

- **Findings – frequency of DOWN**

<table>
<thead>
<tr>
<th>Rank</th>
<th>PVs (with ‘down’)</th>
<th>Raw frequency</th>
<th>% of all PVs with ‘down’ in the corpus</th>
<th>Cumulative %</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>track</td>
<td>54</td>
<td>18.06</td>
<td>18.06</td>
</tr>
<tr>
<td>2</td>
<td>run</td>
<td>42</td>
<td>14.04</td>
<td>32.10</td>
</tr>
<tr>
<td>3</td>
<td>put</td>
<td>39</td>
<td>13.04</td>
<td>45.15</td>
</tr>
<tr>
<td>4</td>
<td>narrow</td>
<td>26</td>
<td>8.69</td>
<td>53.84</td>
</tr>
<tr>
<td>5</td>
<td>go</td>
<td>19</td>
<td>6.35</td>
<td>60.2</td>
</tr>
<tr>
<td>6</td>
<td>take</td>
<td>18</td>
<td>6.02</td>
<td>66.22</td>
</tr>
<tr>
<td>7</td>
<td>shut</td>
<td>13</td>
<td>4.34</td>
<td>70.56</td>
</tr>
<tr>
<td>8</td>
<td>sit</td>
<td>12</td>
<td>4.01</td>
<td>74.58</td>
</tr>
<tr>
<td>9</td>
<td>calm</td>
<td>8</td>
<td>2.67</td>
<td>77.25</td>
</tr>
<tr>
<td>10</td>
<td>hunt</td>
<td>8</td>
<td>2.67</td>
<td>79.93</td>
</tr>
<tr>
<td>11</td>
<td>get</td>
<td>7</td>
<td>2.34</td>
<td>82.27</td>
</tr>
<tr>
<td>12</td>
<td>burn</td>
<td>5</td>
<td>1.67</td>
<td>83.94</td>
</tr>
<tr>
<td>13</td>
<td>chase</td>
<td>4</td>
<td>1.33</td>
<td>85.28</td>
</tr>
<tr>
<td>14</td>
<td>cut</td>
<td>4</td>
<td>1.33</td>
<td>86.62</td>
</tr>
<tr>
<td>15</td>
<td>lock</td>
<td>4</td>
<td>1.33</td>
<td>87.95</td>
</tr>
<tr>
<td>16</td>
<td>back</td>
<td>3</td>
<td>1.00</td>
<td>88.96</td>
</tr>
<tr>
<td>17</td>
<td>gun</td>
<td>3</td>
<td>1.00</td>
<td>89.96</td>
</tr>
<tr>
<td>18</td>
<td>knock</td>
<td>3</td>
<td>1.00</td>
<td>90.96</td>
</tr>
<tr>
<td>19</td>
<td>shake</td>
<td>3</td>
<td>1.00</td>
<td>91.97</td>
</tr>
<tr>
<td>20</td>
<td>wipe</td>
<td>3</td>
<td>1.00</td>
<td>92.97</td>
</tr>
<tr>
<td>21</td>
<td>bring</td>
<td>2</td>
<td>0.66</td>
<td>93.64</td>
</tr>
<tr>
<td>22</td>
<td>crack down on</td>
<td>2</td>
<td>0.66</td>
<td>94.31</td>
</tr>
<tr>
<td>23</td>
<td>nail</td>
<td>2</td>
<td>0.66</td>
<td>94.98</td>
</tr>
<tr>
<td>24</td>
<td>shoot</td>
<td>2</td>
<td>0.66</td>
<td>95.65</td>
</tr>
<tr>
<td>25</td>
<td>slow</td>
<td>2</td>
<td>0.66</td>
<td>96.32</td>
</tr>
</tbody>
</table>

~50%
RESEARCH

• Analytical tools

After counting the tokens and verb-types manually, we divided the PVs into different semantic classes:

The PVs with UP were grouped into 7 semantic classes:
Tracking down phrasal verbs: the case of UP

RESEARCH

- Findings – 7 meanings of UP

1) Emergence of evidence:
   turn up, show up, come up, bring up (issues), pop up, throw up (red flags), pick up, give up (info)

1a) Searching for evidence: dig up, dredge up, kick up (dust), stir up, look up, run up, work up, follow up, clear up, read up, study up, chat up, size up, pick up

2) Destruction/Cease functioning:
   blow up (explode), stir up (the crime scene-destroy), tear up, bust up, bang up, hack up, cut up, slice up, beat up, break up (fight), shoot up (a victim), screw up, mess up.

2a) Eliminating the evidence: clean up, pick up, cover up, wipe up, dress up, mix up

3) Collating/compiling the evidence: call up (video), blow up (video), pile up, wrap up (case), seal up, tie up, pack up, sew up, pick up, stack up, round up, mock up, draw up (a document), write up, pull up (list), check up, bring up (captions);

3a) Revealing the evidence: line up with, match up with, back up/shore up
RESEARCH

• Findings – 7 meanings of UP

4) Types of criminal/suspect behaviour: shoot up (take drugs), set up (framing), mob up, tape up, cook up (drugs), dirty up, straighten up, make up (falsify), hole up, hook up, lawyer up, switch up, change up, wrap up (dead body), seal up, go up against, pay up, hold up, spark up, pick up

5) Dealing with criminal behaviour:
   a) arresting: catch up with, grab up, pick up, scare up, snatch up, tune up
   b) punishing: lock up, fill up (cells)
   c) negotiating: offer up, live up to
   d) organizing procedures: rig up, partner up, set up (adopting/taking positions to surround sthg), rig up (camera, bugging device)

6) Giving orders: open up, put up (hands), get up, shut up, keep up (hands), stand up, back up (retreat), hit up (dispatch)

7) Resulting/outcome: end up, turn up (dead), lead up to, wind up
Tracking down phrasal verbs: the case of DOWN

RESEARCH

• Findings – 6 meanings of DOWN

1) Identifying the target:
track down, narrow down, hunt down, chase down, nail down, pin down, cut sthg down

2) Dealing with the prey/kill:
put down (sacrifice an animal), take down, go down (die), gun down, shoot down, bring down, cut down, strike down, shake down

3) Destruction/Decomposition/ Cease functioning: burn down, shut down, lock down, bang down, knock down, break down (strip a rifle), go down (be put in prison), back down (not continue, not proceed)
(3a) Erasing the evidence: wipe down, scrub down

4) Collating/compiling the evidence: run down, boil down, slow down (video), write down (a statement/notes

5) Giving orders: put down (a weapon), calm down, sit down, throw down, get down (take cover)

6) Happen, occur- go down (crime)
RESEARCH

Analytical tools


UP – basic meaning

• Movement from a lower to a higher place

UP – metaphorical meaning

• Reaching the goal / end / limit
• Moving to a higher degree / value / measure
• Higher is more visible
• Completely: the highest limit or end
Tracking down phrasal verbs: the case of UP and DOWN

RESEARCH

• Findings for UP

Following Rudzka-Ostyn’s (2003) cognitive motivations to identify the meaning extensions of UP and DOWN in our corpus, we came up with the following 5 clusters:

1) UP: position at a high place or moving up to a higher one- dig up (literal meaning), put (entity) up, get up, keep (hands) up, stand up, pick up,

2) UP (to): aiming at or reaching a goal, an end, a limit- back up, lead up to, go up against (lack of connectivity), catch up with, hook sb up, line up with, match up with, follow up, give up (an activity), fill up, give sb up (deliver to authorities), hit up, grab up, snatch up, lock up

3) UP: moving to a higher degree, value or measure- blow up (enlarge picture), change up, switch up, live up to, shore up, back up, stack up, pile up, shoot up (drugs), mob up, offer up, dirty up, straighten up, lawyer up, spark up
Tracking down phrasal verbs: the case of UP

RESEARCH

• Findings for UP

4) UP: higher up is more visible, accessible, known-

show up, turn up, pop up, bring up (issue), bring up (on a

screen), bring up on charges, come up (appear), come up

with, call sth up (screen), pull up (screen), give up (info),

throw up (red flags), dig up (info), dredge up, kick up, stir up,

look up, run up, read up, study up, chat up, size up, clear up,

mock up, draw up (document), write up, set up (bring about a

bad situation for sb, make him become a suspect), round up,

mount up, rig up, cook up (drugs), make up (falsify)

5) UP: covering an area completely/reaching the highest limit-

blow up (explode), dress up, clean up, cover up, stir up (crime scene-destroy), tear

up, bust up, bang up, hack up, cut up, slice up, beat up, break up (fight), shoot

up (victim), screw up, mess up, wipe up, mix up, wrap up (case), seal up, tie

up, pack up, sew up, check up, tune up, wind up, turn up (dead), end up, open

up, shut up, hole up, tape up, wrap up (dead body), pay up, hold up
RESEARCH

Analytical tools


DOWN – basic meaning

• Movement from a higher to a lower place

DOWN – metaphorical meaning

• Time and geographically orientated motion

• Decrease in intensity, quality, quantity, size, degree, value, activity, status, strength…

• Completion: reach a goal or extreme limit down the scale

• Movements of eating or writing
Tracking down phrasal verbs: the case of DOWN

RESEARCH

• Findings for DOWN

The 4 meaning extensions for DOWN are as follows:

1) **DOWN: movement from a higher to a lower place** - put down (a weapon), sit down, throw down, get down, shoot down (plane), run down (list), come down

2) **DOWN: decrease in intensity, quality, quantity, size, degree, value, activity, status, strength** - cut down (reduce a number), narrow down, calm down, slow down, crack down on, back down, shake down

3) **DOWN: reach a goal, completion, extreme limit down the scale** - bring down, put down (kill), boil down, pin down, nail down, shut down, burn down, lock down, hunt down, chase down, track down, knock down, bang down, go down (die), wipe down, scrub down, take down, cut down (kill), gun down, strike down, shoot down, break down

4) **DOWN: movements of eating and writing** - write down
Implications

• Need to teach basic concept of particle
  TPR
to help learners comprehend and assimilate verticality as a concept or prototype for the meaning of UP and DOWN

• Need to provide:
  - learner-friendly sources
  - exercises adapted to specific learners
  - multi-channel transfer possibilities
  - rule elaboration depending on students’ L1

• Assignation of PVs to relevant group of meaning (using concordance lines; examination of cognitive motivation of particle & noun collocates (Liu, 2001))
to enable students to comprehend and assimilate the meaning extensions along the spectrum from literal to figurative/metaphorical entailment to build up their own semantic networks
Future research

• Develop teaching / learning applications that draw on experiential learning (Kolb, 1984)

By facilitating analysis & perception of relations between literal and figurative meanings, we are likely to foster faster acquisition, longer retention & maybe generation of PVs

Assignation of PVs to relevant meaning group

hearing/reading real instances

analysing concordance lines

unscrambling sentences
Future research

Build on research conducted by Condon (2008), to enable students to deepen their understanding of the concept, firm up their own form-function mappings, and hence facilitate their own PV-generating skills

- Extend our research to cover adverbial pairings eg in/out, on/off, etc. in relation to crime

- Compare and contrast our findings from the American TV series with a corpus culled from a British crime series
Tracking down phrasal verbs: the case of UP and DOWN

Thank you.

Any questions?
Thank you
Please do not hesitate to contact us if you have any comments or queries

Andreea Rosca & Yvonne Baker de Altamirano

arosca@unizar.es  baker@unizar.es