Danish Names and the Duke of York

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GLAC9, SUNY Buffalo, April 25, 2003

The Grand Old Duke of York
He had ten thousand men
He marched them up a great high hill
And he marched them down again

- Pullum (1976): can Duke of York (DoY) derivations be banned systematically by a universal principle? No (but a reluctant no)
- We argue that in the domain of morphological derivations, DoY derivations **can** be systematically eliminated (Hankamer and Mikkelsen 2002:158)

(1) **Duke of York Blocking**

*X $\rightarrow$ Y $\rightarrow$ Z, where

a. X is basic,

b. $\rightarrow$ are morphological processes, and

c. X and Z compete for the same slot.

- Not only is the existence of (1) attested in several different morphological domains, it is derivative of an even more fundamental principle, which we will call Panini's Principle (also known as the Elsewhere Principle (Kiparsky 1982:6–9)):

(2) **Panini's Principle**: when two formation rules compete for the expression of one and the same morphological category, the more specific rule trumps the more general one.

Outline

1. A puzzle about definiteness marking and names in Danish (and Swedish)
2. Background on morphological blocking and the relevance of Panini's Principle
3. Duke of York Blocking as a corollary of Panini's Principle
4. Examples of Duke of York Blocking
5. Danish names redux
6. Conclusion

1 The Danish Names Puzzle

- In Danish, definiteness is expressed by a suffix on the noun, where there are no modifiers in the noun phrase:

(3) hest-en
horse-DEF
'the horse'

- Singular names never occur with the definite suffix:

(4) *Maria-en
Mary-DEF
'the Mary'

- Even when singular names are used as common nouns (Thomsen 1997), they still don't occur with the definite suffix:[1]

(5) *Jeg kender Maria-en du tænker på.
I know Mary-DEF you think of
'I know the Mary you have in mind.'

- Plural names used as common nouns **can** get the definite suffix (but they don't have to):

(6) Maria-er-ne
Mary-PL-DEF
'the Marys'

- **Puzzle** Why is (4) bad, but (6) good?

[1] As discussed in Hankamer and Mikkelsen (2002:151–152) names can occur with the definite prenominal article in certain contexts, including noun phrases containing a restrictive relative clause, like that in (5).

2 Blocking

Paul (1896)

- "Konkurrenz gleichbedeutender Ausdrucksformen" (competition of same-meaning expression-forms).
- "Funktionen": slots in a paradigm
- paradigm cells can only have one occupant, so when there are competing forms for a given cell, only one form can win.
- when the competition is between a "simpler" form and a more complex form, the simpler form wins.
- Ex: blocking of verbal nouns in *-ung* by the existence of "simpler" (basic) forms (pp. 705–706):

(7)

Basic Noun	Verbal form	Noun derived with *-ung*
Arbeit	arbeiten	*Arbeitung
Antwort	antworten	*Antwortung
Bann	bannen	*Bannung
Druck	drücken	*Drückung
Folge	folgen	*Folgung
Furcht	fürchten	*Fürchtung
Urteil	urteilen	*Urteilung
Streit	streiten	*Streitung

- No blocking when no basic noun exists:

(8)

Basic Noun	Verbal form	Noun derived with *-ung*
—	bearbeiten	Bearbeitung
—	verantworten	Verantwortung
—	verbannen	Verbannung
—	unterdrücken	Unterdrückung
—	befolgen	Befolgung
—	befürchten	Befürchtung
—	verurteilen	Verurteilung
—	bestreiten	Bestreitung

Aronoff (1976)

- re-introduces the notion of blocking in the context of generative morphology to account for complementarity in noun/adjective pairs (p. 43):

(9)	space	spacious	*spaciosity	spaciousness
	grace	gracious	*graciosity	graciousness
	glory	glorious	*gloriosity	gloriousness
	—	curious	curiosity	curiousness
	—	tenacious	tenacity	tenaciousness

- the rule forming nouns in *-ity* (third column) from adjectives is **blocked** by the existence of the underived noun (first column).
- Similarities with Paul's proposal:
  - morphological paradigms (in an extended sense) have "slots" (equivalent to Paul's "Funktionen") which can be filled by no more than one form; and
  - in some cases at least the competition is decided in favor of more basic or simpler forms (in Aronoff's case, underived forms trump derived forms).
- To account for the failure of the underived nouns to block derived nouns in *-(ous)-ness* (column 4), Aronoff suggests that such forms are not in competition for a slot at all, because the *-ness* rule is productive and forms derived by it do not need to be listed. He thus proposes that blocking due to competition for a slot is restricted to non-productive processes.
- However, just a few pages later (p. 55), Aronoff invokes blocking again to account for the absence of nouns in *-ness* when there is a noun in *-cy*:

(10)	profligate	profligacy	*profligateness
	decent	decency	*decentness
	aberrant	aberrancy	*aberrantness

- Here a productive rule (the *-ness* rule) is blocked by forms derived by another productive rule (*-cy* productively attaches to adjectives in *-ate*/*-ant*/*-ent*).
- So either
  1. there are two kinds of blocking (Scalise 1984:158–160); or
  2. there is only one kind of blocking, and Aronoff was wrong about the failure of underived nouns to block *-ness* nouns.

We propose:

1. Aronoff was wrong in the assumption (p. 43) that blocking is restricted to non-productive rules.

2. *-ness* nouns are not blocked by underived nouns because they are not competing for the same slot in the paradigm. We will argue that *-ity* forms compete for the basic N slot, while *-ness* forms compete for a different (derived) abstract N slot. It is this slot which is the object of competition between *-cy* forms and *-ness* forms, and here the *-cy* forms win.

3. There is just one principle determining which form will win the competition for a slot, and that is Panini's Principle (stated in (2) above), see Kiparsky (1982:6–9), Andrews (1990:508), and references cited there.

3 DoY Blocking as a corollary of Panini's Principle

- Recall:

(11) **Duke of York Blocking**

*X $\rightarrow$ Y $\rightarrow$ Z, where

a. X is basic,

b. $\rightarrow$ are morphological processes, and

c. X and Z compete for the same slot.

- If X is a lexical form, it exists by virtue of the most specific kind of rule imaginable (cf. the "Identity Rules" of Kiparsky (1982:8–9)):

(12) express *splish* as *splat*, where

a. *splish* is a bundle of features, and

b. *splat* a phonological representation.

- Then if Y $\rightarrow$ Z is a process that affects more than one item, and the result (Z) is in competition with X for the expression of a morphosyntactic category, then by Panini's Principle the basic form X wins the contest and the process Y $\rightarrow$ Z is blocked.

4 Examples of DoY Blocking

1. Paul's *Arbeit* – *arbeiten* – **Arbeitung* (see table (7))

   - *Arbeit* is basic, and **Arbeitung* is competing for the same slot, so it is blocked.

2. Aronoff's *space* – *spacious* – **spaciosity* (see table (9)).

   - *space* is basic, and **spaciosity* is competing for the same slot, so it is blocked.

3. Turkish desubstantive verbs:

   - Turkish has a number of suffixes that derive verbs from substantives (adjectives and nouns), some of them quite productive (though none are fully productive):

(13)

suffix	Substantive		Derived verb	
-le	balta	'axe'	balta-la	'to hit with an axe'
	göz	'eye'	göz-le	'to watch for'
	kilit	'lock'	kilit-le	'to lock'
	kir	'dirt'	kir-le	'to get dirty'
	su	'water'	su-la	'to water'
	yumurta	'egg'	yumurta-la	'to lay an egg'
-len	temiz	'clean'	temiz-len	'to get clean' (intr)
	kir	'dirt'	kir-len	'to get dirty' (intr)
	serin	'cool'	serin-len	'to become cool'
	can	'soul'	can-lan	'to become lively'
	ev	'house'	ev-len	'to marry' (intr)
-let	temiz	'clean'	temiz-let	'to clean' (tr)
	kilit	'lock'	kilit-let	'to lock' (tr)
	kir	'dirt'	kir-let	'to get dirty' (tr)
-leş	karşı	'against'	karşı-laş	'to meet'
	serin	'cool'	serin-leş	'to become cool'
	dert	'pain'	dert-leş	'to pour out one's grief'
	mektup	'letter'	mektup-laş	'to correspond'
	tanrı	'god'	tanrı-laş	'to become divine'
	ölmez	'immortal'	ölmez-leş	'to become immortal'

   - Turkish also has a number of suffixes that form deverbal substantives:

(14)

suffix	Verb		Derived A/N	
-ik	birleş	‘unite’	birleş-ik	‘united’
	boz	‘destroy’	boz-uk	‘broken’
	çık	‘come out’	çık-ık	‘dislocated’
	değiş	‘change’	değiş-ik	‘varied’
	sök	‘undo’	sök-ük	‘unravelled’
-i	dol	‘be filled’	dol-u	‘full’
	kork	‘fear’	kork-u	‘fear’
	koş	‘run’	koş-u	‘race’
	öl	‘die’	öl-ü	‘corpse’
	yap	‘make’	yap-ı	‘construction’
ti	belir	‘appear’	belir-ti	‘symptom’
	buyur-ul	‘be ordered’	buyur-ul-tu	‘command’
	bula-n	‘be nauseated’	bula-n-tı	‘nausea’
	çalka-n	‘be agitated’	çalka-n-tı	‘agitation’
-gi	sev	‘love’	sev-gi	‘affection’
	iç	‘drink’	iç-ki	‘drink’
	çal	‘play’	çal-gı	‘musical instrument’
	bur	‘twist’	bur-gu	‘gimlet’
	ör	‘interlace’	ör-gü	‘plait’

- Strikingly, even the most productive verb-forming suffixes do not form verbs from substantives that are themselves derived from verbs:

(15)

simple verb		derived N/A		derived verb
bur	‘twist’	bur-gu	‘gimlet’	*bur-gu-la
ör	‘interlace’	ör-gü	‘plait’	*ör-gü-le
dol	‘be filled’	dol-u	‘full’	*dol-u-lan
değiş	‘change’	değiş-ik	‘varied’	*değiş-ik-len
bir-leş	‘unite’	bir-leş-ik	‘united’	*bir-leş-ik-len
öl	‘die’	öl-ü	‘corpse’	*öl-ü-leş
bula-n	‘be nauseated’	bula-n-ti	‘nausea’	*bula-n-ti-laş
ör	‘interlace’	ör-gü	‘plait’	*ör-gü-leş
bir-leş	‘unite’	bir-leş-ik	‘united’	*bir-leş-ik-let
boz	‘destroy’	boz-uk	‘broken’	*boz-uk-lat
çık	‘come out’	çık-ık	‘dislocate’	*çık-ık-lat

Other cases of blocking

1. Aronoff's *decent* – *decency* – **decentness* (see table (10)).

   - the *-cy* rule has a more restricted domain of application than the *-ness* rule (the *-cy* rule only applies to adjectives in *-ate*, *-ant*,*-ent*) so the existence of *decency* blocks *decentness* (assuming that they are competing for the same spot).

2. Turkish causatives (Kornfilt 1997:454)

   - The causative of a verb formed with *-len* is regularly formed by further suffixation of *-dir*:

(16) ev 'house' ev-len 'marry' ev-len-dir 'give in marriage'

   - But when there exists a causative formed more directly with *-let*, the *-len-dir* form is not possible:

(17) kir 'dirt' kir-len 'get dirty' (intr) kir-let 'get dirty' (tr) *kir-len-dir

   - Clearly, the more specific formation (*kir-let*) is blocking the more general formation (**kir-len-dir*)

These are not cases of Duke of York Blocking as defined in (1), since the form that is doing the blocking is not basic. But these cases of blocking are still accounted for under our general approach, where morphological forms compete for paradigm slots and the competition is governed by Panini's Principle. Notice that all that is required (to include these under DoY blocking) is to drop condition a. in (1).

5 Danish Names Redux

- Recall:

(18) hest-en
horse-DEF
'the horse'

(19) *Maria-en
Mary-DEF
'the Mary'

(20) Maria-er-ne
Mary-PL-DEF
'the Marys'

- Hankamer and Mikkelsen (2002) propose a rule converting nouns to definite determiners:

(21) RULE D (from H&M p. 155)

$$\begin{bmatrix} PFORM & \alpha \\ CAT & \text{N} \end{bmatrix} \Rightarrow \begin{bmatrix} PFORM & \alpha + \textsc{en} \\ CAT & \text{D} \\ DEF & + \end{bmatrix}$$

Where:

a. EN represents the appropriate form of the definite suffix relative to the number and gender of the noun,[2]

b. DEF is a morphosyntactic feature defined for determiners, but not for nouns (in Danish), introduced by the rule, and assigned the value '+', and

c. parts of the [lexical] entry not mentioned in the rule are not affected.

- Names are lexically Ds (there is no head movement in H&M's system)

- but there is a morphological process — zero derivation, since it does not affect the form — that converts names to common nouns:

(22) $[\text{'Name'}]_D \rightarrow [\text{'Name'}]_N$

- The nonexisting form in (19) would have to be derived in the following way:

(23) $[\text{Maria}]_D \rightarrow [\text{Maria}]_N \rightarrow [[\text{Maria}]_N \text{ -en}]_D$

- But, since the derived form (*Maria-en*) is featurally indistinct from the basic form (*Maria*), the derived form is Duke-of-York blocked, accounting for the '*' on (19).

- The plural form *Mariaerne* (= (20)) is not blocked because there is no simpler form that it competes with for expression of the same morphological category.

- Likewise, the singular definite form *hesten* (= (18)) is also not blocked because there is no simpler form that it competes with.

[2] i.e. *-en* for singular, common gender nouns, *-et* for singular, neuter gender nouns, and *-ne* for plural nouns.

6 Conclusion

We have had to take a lengthy detour in order to get to a satisfactory solution to the puzzle of definiteness marking in Danish names, but (if the proposal developed along the way is accepted) we have gained the following understanding:

- Morphological blocking is real, and not limited to non-productive processes
- It is more unified than might have been thought
- It derives from a deeper principle (Panini's Principle)
- It shows up in diverse contexts (Paul's **Arbeitung*, Aronoff's **spaciosity* and **decentness*, Turkish desubstantival verbs, Danish names), as would be expected of a deep and universal principle.
- Definiteness marking on Danish (and Swedish) names is not a mystery.

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