

Starvation and Famine among SCCS Societies

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1. INTRODUCTION

General starvation is a disease resulting from inadequate caloric intake. It is endemic in some societies. Most have experienced epidemics, including outbreaks of sufficient acuity to qualify as famine. The data encoded here measure the extent to which Standard Cross-Cultural Sample (SCCS) societies have been subjected to such experiences.

The codes pertain to ten variables: (1) ordinary nutritional conditions, (2) occurrence of short-term starvation, (3) occurrence of seasonal starvation, (4) temporal proximity of seasonal starvation, (5) occurrence of famine, (6) temporal proximity of last famine, (7) severity of famine, (8) persistence of famine, (9) recurrence of famine, and (10) contingency of famine. The contingency codes have not been published previously. The others originally appeared in the journal *CROSS-CULTURAL RESEARCH* (Dirks 1993). Note, however, that the scale for the recurrence of famine has been modified since its original publication and the codes revised accordingly. Codes for other variables have been changed in a few cases because of newly acquired information.

1. Time Lines

All data indicative of starvation is situated with reference to the SCCS focus dates established by Murdock and White (1969). Data representative of the ethnographic present derive from observations made within a twenty-two year period, beginning two decades before and ending two years after the focus date. Codes for endemic and short-term starvation pertain exclusively to the ethnographic present. Those for the occurrence of seasonal starvation and the occurrence and severity of famine do not. Rating for these variables derive from all observations irrespective of date. Temporal control codes accompany the seasonal starvation and famine data sets. These allow users to separate codes based on present experiences from those based on observations either pre-dating or post-dating the ethnographic present.

2. Identifying Starvation

The identification of general starvation depends on finding either of the following sorts of statements in ethnographic or historical accounts:

(1) Statements reporting a deficiency in diet or food intake. A deficiency in diet or food intake is indicated by direct references to starvation. Other indications include references to hunger, general undernutrition, general malnourishment, protein-calorie malnutrition, and either weight loss or inanition owing to lack of

food. Descriptions of vitamin, mineral, or other specific nutritional deficiencies do not count as evidence of starvation.

(2) Statements reporting a dearth in food supply. Evidence of dearth takes three forms.

(2.1) Direct references to famine or food insufficiency.

(2.2) References to inadequate supplies (e.g., empty storehouses, reduction in the number of daily meals).

(2.3) Descriptions of conditions adversely affecting food supplies (e.g., drought, unseasonal cold, crop pestilence).

Statements of the latter two sorts (2.2 and 2.3) are not accepted without accompanying descriptions of physical or social distress. Signs of physical distress include resort to unusual foods, disease outbreaks, and increased mortality. Signs of social distress include population displacements, various institutional breakdowns (e.g., dissolution of families, failure of markets, collapse of law and order).

3. Rating Occurrence

In reviewing the coding for starvation, note that occurrence is not rated in simple binary fashion--i.e., yes (present) or no (absent). The reason stems from the uncertainties involved in detecting starvation first-hand. Often it is very difficult. To make matters worse, ethnographic and historical accounts are far from complete, especially for societies remote from metropolitan centers. Consequently, ratings run from "low" to "high." They are best read as gauging relative likelihoods. The likelihood of society being afflicted by starvation in any form increases as reason to doubt its occurrence decreases.

4. Scales

1261. Ordinary Nutritional Conditions and Endemic Starvation

The codes for ordinary nutritional conditions are ordered with an eye toward assessing the likelihood of endemic starvation. Cases of reported abundance rank low, meaning endemic starvation is unlikely.

Ordinary nutritional conditions are assessed from characterizations of "average" or "typical" diets or normal levels of food supply. Descriptions of peak conditions or conditions observed just before the onset of a starvation epidemic are accepted in the absence of such characterizations. Unqualified or unmarked statements about nutrition are taken as indicative of ordinary conditions so long as context shows they are not based on observations made during periods of shortage.

N	Rank	Information Required
85	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to an alternative rank.
38	1	VERY LOW -- sources indicate background nutrition conditions are good or excellent; describe diet or food supply as abundant or more than adequate.
35	2	LOW -- sources indicate background nutrition conditions are fair; describe diet or food supply as adequate or sufficient.
23	3	HIGH -- sources indicate background nutritional conditions are poor; describe diet or food supply as marginal, barely adequate or somewhat less than adequate; associate diet or food supply with behavior or health problems among some segment of society (e.g., children, impoverished households);

		refer to poor diet or undernourishment with specific reference to some segment of society.
5	4	VERY HIGH -- sources indicate background nutritional conditions are extremely poor; describe diet or food supply as grossly inadequate; refer to poor diet or undernourishment as widespread.

Ratings pertain to the ethnographic present. Declarations referring to conditions observed later than the ethnographic present may be used to assess ordinary nutritional conditions so long as sources contain no evidence of an intervening change in subsistence patterns.

1262. Occurrence of Short-Term Starvation

Short-term starvation is defined as an episode of starvation having a duration on the order of a few days or weeks. Such episodes occur unpredictably. Nevertheless, they are typically recurrent and familiar. As a result, outbreaks do not excite alarm. Short-term starvation, however painful, usually does not result in death. An occasional death, especially among the very old, may be allowed as an exception.

N	Rank	Information Required
17	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to an alternative rank.
21	1	LOW -- sources assert starvation in general is unlikely or does not occur.
133	2	MODERATE -- sources describe diet or food supply, contain no evidence of short-term starvation.
15	3	HIGH -- sources directly refer to or contain evidence of brief periods of starvation.

Ratings attend exclusively to the ethnographic present. When starvation is not explicitly linked to past conditions or circumstances that no longer exist it is assumed to be a problem in the ethnographic present.

1263. Occurrence of Seasonal Starvation

Seasonal starvation occurs at regular times every year. It may last from several weeks to as long as 3 or 4 months. It frequently is accompanied by increased morbidity and mortality, especially among children and the elderly. However, such increases are not detected readily and, until recently, not often reported. Like short-term starvation, seasonal starvation is a familiar event. Consequently, societies that experience it have a repertory of customary adjustments by means of which they avoid social disruption.

The scale makes a distinction between outside observers' reports of seasonal starvation and native definitions of nutritionally difficult periods. This distinction is important considering claims that indigenous definitions are at times a purely cultural product inspired by annual shortages of staples or other locally important foods (e.g., a seasonal shortage of corn, a period of difficulty catching fish). People may declare they are starving, but outside observers fail to detect evidence of it. This fosters a suspicion that what is being expressed is a hunger for favorite foods rather than frank deprivation. Because of the greater uncertainty, the scale ranks cases in which the only evidence of seasonal distress comes from indigenous pronouncements inferior to those in which starvation is indicated by distanced observation.

N	Rank	Information Required
18	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to an alternative rank.
35	1	VERY LOW -- sources assert seasonal starvation or starvation in general does not occur.
5	2	LOW -- sources refer to starvation in general as rare or

		infrequent.
64	3	MODERATE -- sources describe diet or food supply, contain no evidence of seasonal starvation.
29	4	HIGH -- sources refer to native perceptions or definitions of seasonal privations; associate shortages of particular foods, reduced food intake, or native anxieties about hunger with particular times of the year; describe certain months as difficult; may express doubt starvation actually occurs.
35	5	VERY HIGH -- sources directly refer to or contain evidence of seasonal starvation.

Ratings are not tied solely to the ethnographic present. To locate evidence of seasonal starvation in relation to the ethnographic present, refer to the temporal control codes and the scale immediately below.

1264. Temporal Control Codes for Seasonal Starvation

The temporal codes for seasonal starvation are assigned with reference to the following informational requirements:

N	Rank	Information Required
123	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to an alternative rank.
5	0	POST-DATES -- sources indicate seasonal starvation occurs, but evidence post-dates ethnographic present.
4	1	REMOTE -- sources situate seasonal starvation in the past; describe occurrence more than 20 years prior to the focus date.
54	2	PROXIMATE -- sources indicate seasonal starvation or seasonal hunger occurs in the ethnographic present; describe occurrence no more than 20 years prior to the focus date.

Each case is accorded the highest rank allowed by the evidence.

1265. Occurrence of Famine

Famine refers to an episode of starvation attended by sharply increased mortality rates and marked disruptions in social life. Its duration exceeds short-term starvation. Unlike seasonal starvation it does not occur annually. Famine lacks a routine character. It disrupts society from the start and can progress to the point of massive institutional collapses.

A distinction is made between cases in which famine is documented locally and cases in which famine is documented solely for a region. The inferior ranking assigned to the latter cases allows for the possibility that the focal community escaped suffering.

All signs of episodic starvation are regarded as indications of famine unless attributes of short-term or seasonal starvation are evident. This expedites coding by accommodating the many ways in which famine is identified. At the same time, it does not allow whatever authors call "famine" to become encoded as such.

N	Rank	Information Required
16	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to an alternative rank.
16	1	VERY LOW -- sources state famine or starvation in general is unlikely or does not occur.
28	2	LOW -- sources describe diet or food supply, contain no evidence of famine.
12	3	HIGH -- sources refer to famine in the region where the focal

society is situated, do not state the focal group escaped suffering. 114 4 VERY HIGH -- sources refer to or contain evidence of famine specific to the focal society.

Ratings for the occurrence of famine are not time focused. To situate famine in relation to the SCCS focus date, refer to the temporal control codes and the scale immediately below.

1266. Temporal Control Codes for the Occurrence of Famine

The following informational standards apply to the assignment of temporal codes for famine:

N	Rank	Information Required
62	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to an alternative rank.
6	0	POST-DATES -- sources indicate famine occurs, but evidence post-dates ethnographic present.
6	1	VERY REMOTE -- sources situate famine in the very distant past; place the most recent famine at more than 200 years ago; refer to famine only in myth or folklore.
4	2	REMOTE -- sources situate famine in the distant past; place the most recent famine at more than 100 years ago (but no more than 200 years ago).
27	3	PROXIMATE -- sources situate famine in the past or near-past; place most recent famine at more than 20 years ago (but no more than 100 years ago); state older members of society experienced famine or recall stories of famine experienced by the previous generation.
81	4	VERY PROXIMATE -- sources refer to famine in the ethnographic (or ethnohistorical) present; place most recent famine within 20 years of focus.

The coding rule is to assign the highest rank possible consistent with reported occurrence.

1267. Severity of Famine

The severity of famine refers to the extent to which a community or some segment of it experiences increased mortality and progresses toward complete institutional breakdown. For those cases where descriptions of conditions are missing but famine is indicated, the codes rely directly on authors' statements about severity. Unless sources state otherwise, famines associated with particular seasons are regarded as being of moderate duration, and severity is scaled accordingly. For those cases in which authorities insist starvation does not occur, the codes allow for the possibility of an unrecorded, mild experience with famine. Thus, such cases are assigned a rank at the extreme low end of the scale. Otherwise, assessments pertain to the most severe famine mentioned in the source materials.

N	Rank	Information Required
76	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to an alternative rank.
16	1	VERY LOW -- sources indicate famine or starvation in general is unlikely or does not occur.
7	2	LOW -- sources characterize famine as mild or brief; describe resort to secondary foods (fail-safe crops, items normally consumed but not as staples).
33	3	HIGH -- sources relate famine to a bad season (e.g., a winter of extraordinary privations, a poor fishing season); describe extraordinary food-related behaviors (e.g., resort to foods not otherwise eaten; food preparation techniques never observed in

		normal times; refusal to share or sell food, seeking or receiving relief supplies); report individual migrations in search of food or work; note the death of certain categories of individuals (e.g., children, the elderly).
54	4	VERY HIGH -- sources describe famine as severe; report migration of entire households or communities; tell of institutional collapse (e.g., dissolution of families, breakdown of law and order); attribute homicide, disease epidemics or generally increased mortality rates to famine.

Severity ratings apply to famines post-dating the ethnographic present only in those cases where there is no other evidence of famine.

1268. Persistence of Famine

The persistence of famine refers to the frequency of its occurrence in the recent past. As defined here, the recent past includes the ethnographic present plus the preceding fifty years. This serves to gauge roughly how often a living set of generations (child, parent, grandparent) has had direct experience with famine.

The process of rating persistence in historically well-documented cases is simply a matter of counting. In cases where specific famines are not referred to, authors' characterizations (e.g., famine is rare, major crop failures occur often) are taken as indicators of persistence. For those cases in which authors refer to no more than one famine and the episode is undated, it is assumed to have occurred in the recent past.

N	Rank	Information Required
81	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to alternative rank.
29	1	LOW -- sources state famine or starvation in general is unlikely or does not occur; provide dates or other information indicating an absence of famine in the recent past.
27	2	MODERATE -- sources refer to famine as rare, infrequent, or uncommon; describe famine as having occurred once in living or recent memory; contain dates indicating no more than one famine in the recent past.
49	3	HIGH -- sources refer to famine as frequent; assert living members of society have experienced famine more than once; contains dates indicating more than one famine in the recent past.

1269. Recurrence of Famine

Recurrent famine is indicated by repeated outbreaks over a relatively long period of time. Here a society is regarded as experiencing recurrent famine if outbreaks have occurred both within the recent past (as defined above) and there has been at least one outbreak within the preceding one hundred years (between 70 and 170 years prior to the focus date).

N	Rank	Information Required
57	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to alternative rank.
28	1	LOW -- sources indicate famine or starvation in general is unlikely or does not occur; refer to famine only in myth or legend; date last famine beyond the recent past.
87	2	INTERMEDIATE -- sources contain evidence of famine within recent past; do not rule out occurrences during the preceding 100 years.
14	3	HIGH -- sources provide evidence of recent famine and at least

one famine within the preceding 100 years.

1270. Contingency of Famine

Low contingency famines occur with great regularity and may be anticipated. High contingency famines arise from novel and relatively unpredictable events.

N	Rank	Information Required
85	.	UNCODED -- sources do not describe diet or food supply; do not support assignment to alternative rank.
16	0	ABSENT -- sources indicate famine or starvation in general is unlikely or does not occur.
13	1	LOW -- sources state famine occurs with some regularity or predictability (e.g., every 11 years); describe pattern of tight intervals e.g., famine every 5 to 7 years); N.B., statements about average rates (e.g., famine strikes one year in every ten) are not evidence of low contingency.
45	2	INTERMEDIATE -- sources link frequent famine to events which occur repeatedly but are not exactly predictable (e.g., recurrent drought, periodic invasion of insects, hard winters, enemy raids).
27	3	HIGH -- sources describe famine as unusual; characterize causes as various and unpredictable; provide dates suggesting sporadic occurrence; associate famine with novel, irregular, or singular events (e.g., introduction of new disease; revolution; World War; foreign invasion).

In rating contingency, any evidence of famine within 100 years of the SCCS focus date is regarded as pertinent. The coding rule is to apply the lowest possible ranking consistent with evidence.

5. References Cited

Dirks, Robert

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