DISCERNING VOTING PATTERNS IN THE UNITED NATIONS: A FACTOR ANALYSIS OF THE TWENTY-FIFTH SESSION OF THE GENERAL ASSEMBLY

by

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CHAPTER I

INTRODUCTION

Nature of the Problem

Former Secretary-General U Thant claimed the United Nations General Assembly to be "a realistic representation of the present day world."[1] Many researchers have sought to determine exactly how "realistic" are the international relations reflected by that body. One United Nations record under investigation takes the form of roll call votes. The United Nations provides a forum for nations to air their views which are often subsequently recorded by roll call vote. Though those votes are hardly the only source of information about a nation's policy position, they do offer a unique and easily accessible record in which nations have committed themselves on a wide range of major political issues.

It has been argued that the world politics ascertained from actions within the General Assembly is severely distorted due to the one-nation, one-vote principle which is not representative of real life international power relationships. The "sovereign equality" described in the U.N. Charter takes no notice of differences in size, population, economic development, or political system. This argument has been

countered by more than one researcher, it being pointed out that member states have an even greater incentive to band together in a majority rule situation.[2] This propensity to ally emphasizes those alignments which make up international relationships.

Besides answering questions raised about the nature of an individual nation's behavior relative to its policy stance, one may use roll call votes to examine the international system as a whole. One assessment of roll call studies observed that:

> Roll call analyses turn out to be surprisingly revealing of the state of the international system, and sensitive to changes in it and within some nations.
>
> Roll call votes somehow manage to be a good sample of the nation's roles in the international system.
>
> . . . in spite of their drawbacks, roll call votes are the only type of decisions (in the U.N.) which can be studied with a view to discovering national patterns, since they are the only ones on which the nation's votes are recorded.[3]

Much of the ongoing controversy questions not the usefulness of the roll call data base, but rather the utility of certain research methods to serve as tools for the study of that data. As the title of this report suggests, factor analysis is the method chosen for this study. As an aid to understanding how this research method evolved, this report will dedicate a chapter in which the development of empirical roll call studies will be traced from beginnings when research-

ers depended upon logic and methods of statistical analysis which were relatively low-level techniques of numerical comparison. Factor analyses were avoided in those days for the following reason:

> Formerly, a large factor analysis might take a month's calculation for two clerks, and the rotation to simple structure four or five months. Nowadays the former time can be reduced to minutes . . .[4]

The reduction to minutes was due, of course, to the dawning of the age to the computer complete with an avalanche of printouts, most of which contained only pure statistical correlations. Many initial studies lacked both direction and purpose which took their toll in credibility, and and even today the accuracy of social science computer studies are immediately suspect. This study recognizes the need to establish the reliability and validity of this particular application of factor analysis as a statistical procedure to discern voting patterns in the United Nations.

Organization and Intent of this Report

This report will investigate in depth the methodology and findings of previous researchers of United Nations voting behavior. The reason for an historical overview is threefold: First, to illustrate modern factor analysis, the method now usually applied to U.N. roll call votes and the technique employed by this study; Second, to serve as prior research to which the findings of this study may be compared; and third,

to provide a cross-section of theoretical assumptions from which this study may draw.

After presenting prior research, a detailed study of the twenty-fifth session of the General Assembly will be presented along with an explanation of the research method. Theoretical issues, which have been left unanwered by both prior research and that study concerning the validity of quantitative roll call studies, will then be taken up. Finally, new avenues of research will be suggested.

NOTES

1. This direct quotation was taken from a news article, "Thant Asks Give and Take to Settle East-West Issues," New York Times (December 3, 1962).

2. Bruce M. Russett, "Discovering Voting Groups in the United Nations", American Political Science Review, Vol. 60, No. 2, June 1966, P. 327.

3. Hanna Newcombe, "National Patterns in International Organizations, I," Peace Research Reviews, Vol. 4, Nov. 1975, P. 5.

4. Raymond B. Cattell, "The Meaning and Strategic Use of Factor Analysis," Handbook of Multivariate Experimental Psychology (Chicago: Rand, McNally & Co., 1966) P. 186.

CHAPTER II

PREVIOUS RESEARCH

Beginnings

There exists a number of studies of United Nations voting patterns. As early as 1951, M. Margaret Ball discussed "bloc voting" as a framework for analysis:

> The spectre of bloc voting has haunted the United Nations since the Charter was first debated at San Francisco. Since then, the influence of certain groups of states in affecting the outcome of elections has occasioned considerable comment, and it has been suggested that the same groups have been inordinately powerful in deciding substantive issues.[1]

Thomas Hovet Jr.[2] in his Bloc Politics in the United Nations, focused upon the degree of cohesion of caucusing groups on roll call votes over time. He classified the votes into issue categories rather than analyzing specific issues as was done in M. Margaret Ball's earlier paper. Hovet described only the Soviet group as a "bloc", all others lacking the necessary bloc discipline were labeled caucusing groups.

Both studies were substantially similar in that they were primarily verbal discussions of political alignments of groups within the United Nations. Because simultaneous interactions characterize the political process of the General Assembly, a verbal approach fell short of actually elucidating

the dynamics of that process. Clearly, there was a need for a quantitative analysis that did not rely solely on scholarly judgments which were academic and difficult to replicate.

Early Quantitative Research

The quantitative study of roll call votes in the General Assembly is a comparatively recent one, dating from 1960 when Leroy N. Rieselbach[3] first suggested that United Nations votes be subjected to new social science techniques which were being pioneered in investigations of legislative roll calls. In a bloc analysis, Rieselbach constructed a matrix of nations, entering in the cells a simple index of likeness of the two nations on all votes. After considerable rearrangement of the matrix, nations can be grouped together to identify blocs. This technique was not sophisticated enough to continue beyond the delination of relatively small size blocs of four to five nations.

Rieselbach then suggested that a Guttman scale would, in his words, "provide a single continuum for rating the performance of individual countries."[4] His Guttman scale involved formation of a two-dimensional scale, with nations making up one dimension, and issues the other. The nations-by-issues matrix was arranged in a scale manner so that all the "yes" votes were in one corner while the "no" votes were in the opposite corner of the matrix. Nations are arranged according to the highest rank order of issues agreed upon. Therefore if

a nation agrees upon a particular question it also responds positively to all questions of lower rank order. Rieselbach chose eight colonial questions and divided important roll call votes into these subsets to form the Guttman issues scale.

The unidimensionality of the issues scale insures that the nation's behavior is rated upon a single or related group of attitudes, but it is this very property of Guttman scaling that limits its usefulness. Some significant roll calls do not scale in this manner and must be left out. For instance, a roll call unrelated to a colonial question would not measure a colonial attitude and would be omitted. If scales were constructed for all conceivable attitudes, those scales would quite probably be related in some degree to one another and the decision as to where individual roll calls should be assigned becomes difficult. Even if most roll calls do scale, the requirement that the total error not exceed ten per cent is bound to exclude important votes. Another problem arises even in cases where the ten per cent criterion is met, as a decision must be made as to how to classify non-scale response patterns.[5]

In 1963, Arend Lijphart proposed a bloc analysis which entailed the comparison of Rice-Beyle indices for all possible pairs of nations.[6] He had criticized the index of likeness which Rieselbach had incorporated into his matrix of nations because it failed to take into account abstentions

as a valid vote alternative. The Rice-Beyle index of agreement also differed from other indices of group cohesion in that it was comparable for groups of different size. The index simply represents the percentage of votes on which nations agree. Lijphart first compared the groupings of nations that agreed on 95.5 per cent of the roll call votes. He then lowered the agreement level to 87.5 per cent and reexamined the alignments. He found only the Soviet bloc to have a high degree of cohesion, although other groups were recognizable. Lijphart's efforts, just as virtually all the previous analyses, had difficulty in demonstrating cohesion for any groups other than the Soviet bloc.

Factor Analysis

It was a year later that Hayward Alker and Bruce Russett[7] first applied the modern technique of factor analysis to United Nations roll call voting. This technique begins by comparing all nation pairs in almost the same manner as did Rieselbach, but rather than indices of likeness or agreement, more sophisticated correlation coefficients are calculated and entered. Prior studies had always had to assign roll call votes to specific categories of issues. Many roll call votes were sufficiently ambiguous as to cause much controversy over which issue it actually represented, since a vote could be construed to have elements of many issue domains. Factor analysis allows for the identifi-

cation of the principal components or clusters of issues and provides for an accurate location of nations on those components.

Alker and Russett chose the Second, Seventh, Twelfth, and Sixteenth sessions for study.[8] These were the regular sessions commencing in 1947, 1952, 1957, and 1961. They adopted explicit criteria for selecting important roll calls for each session, which included all substantive roll call votes in the plenary session except virtually unanimous votes and only exceptional committee votes. The final result was the selection of 48 roll calls for the Second Assembly, 63 for the Seventh, 50 for the Twelfth, and 70 for the Sixteenth. This accounted for approximately one-third of all the recorded votes. A breakdown of the roll calls incorporated into the analysis of the 16th session yields 26 important committee votes and 44 non-unanimous, non-procedural plenary roll calls.

The first step in the factor analysis yielded two important factors which explained 77 per cent of the roll calls. These were a North-South factor and an East-West factor which fit into a geopolitical model of United Nations voting patterns. A second step in the factor analysis which simplifies the issues, yielded nine principal factors, the six most important being: Self-determination; U.N. Supranationalism; Cold War Membership issues; Moslem issues; French concerns; and Apartheid Condemnation. The first four explained 85 per cent of the votes. Table 1 illustrates that the issues

before the General Assembly are not transitory, but appear year after year.[9]

The third step in factor analysis creates a score for each nation. These are used to compare nations and to aid in discovering national alignments. Various polarization trends were then measured by use of these nation scores and various environmental variables.

Table 1. The Continuity of Issues in the General Assembly

Factor	Percentage of Variance Accounted for in: 1947	1952	1957	1961	1963
Cold War	31	9	23	15	21
Self-Determination		24	23	32	4
Intervention in Africa	6	10	10	-	19
Supranationalism	10	12	7	12	18
Palestine	11	10	-	11	4
Total	59	64	62	70	66

Source, Alker and Russett, 1965. Chapter 3.

Bruce Russett, in his International Regions and the International System, used Q-mode factor analysis, a modification of the normal factor analysis method used by Alker commonly known as R-mode.[10] Rather than grouping the nations on the issue factors, Russett's technique identified clustering nations. He applied the analysis to the 18th General Assembly. Roll calls with over 90 per cent agreement were omitted, leaving 66 roll calls to form the data base. The Q-mode gives numerical values called loadings for each nation. Nations that load similarly on the various factors are grouped together and help to name the factors themselves. Russett extracted six factors or groupings which were as follows: Western Community; Brazzaville Africans; Afro-Asians; Soviet Bloc; Conservative Arabs; and Iberia. Russett interpreted these inductively arrived at groupings as being cultural as well as geographical.

Russett then calculated the nation scores from an R analysis of the same roll calls and correlated those scores with the same nation's factor loadings from the Q-analysis. The correlations which he obtained are shown in Table 2.[11]

Table 2. Correlation of Q-Analysis loadings with Factors

Factor	Cold War	Intervention in Africa	Supranationalism
Western Community	.79	-.33	.38
Brazzaville Africans	.47	.45	.36
Afro-Asians	-.82	.43	.17
Communists	-.52	.45	-.64
Conservative Arabs	.11	.26	.16
Iberia	.10	-.74	-.06

Richard Pratt and Rudolph J. Rummel[12] also analyzed the 18th session of the General Assembly. Their issue factors matched those of the Russett study, with the only difference being the addition of a factor due to a controversy over electric voting machines. When grouping the nations, Pratt and Rummel used the factor scores on the issue factors rather than using the Q-mode technique of Russett. Their reason for not following Russett's example was that they believed the method to be unsound because the correlation coefficients measured only the pattern of each nation's voting behavior and not the level. For instance, if a nation's votes varied between "no" and "abstain", it would be perfectly correlated to a nation voting between "abstain" and "yes" across all roll calls.[13]

Pratt and Rummel's method compared nation scores on each issue cluster. They managed to identify the following blocs: Latin American; Afro-Asian; West; Soviet bloc; and African Colonial.

The studies of Alker and Russett, and of Pratt and Rummel managed to successfully introduce the method of factor analysis into the study of United Nation's voting. However, the assignment of values to a nation's vote varies across the studies as well as the method of factor analysis which is applied to those votes. The upcoming study on the 25th session attempts to borrow the most proven theoretical assumptions and techniques from the prior studies.

NOTES

1. M. Margaret Ball, "Bloc Voting in the General Assembly", International Organization, Vol. 5, 1951, P.4.

2. Thomas Hovet, Jr., Bloc Politics in the United Nations (Cambridge: Harvard University Press, 1960).

3. Leroy N. Rieselbach, "Quantitative Techniques for Studying Voting Behavior in the U.N. General Assembly," International Organization, Vol. 14:2 (Spring, 1960) Pp. 291.

4. Ibid., p. 292

5. Hayward R. Alker, Jr., and Bruce M. Russett, World Politics in the General Assembly (New Haven: Yale University Press, 1965) P. 29.

6. Arend Lijphart, "The Analysis of Bloc Voting in the General Assembly: A Critique and a Proposal," American Political Science Review, Vol. 57, No. 4 (December, 1963) Pp. 902-917.

7. Alker and Russett, World Politics . . . Op Cit., P. 75.

8. Ibid., p. 24-35.

9. Ibid., Pp. 40-47.

10. Bruce M. Russett, International Regions and the International System: A Study in Political Ecology (Chicago: Rand McNally, 1967).

11. Ibid., p. 67.

12. Richard Pratt and Rudolph J. Rummel, "Issue Dimensions in the 1963 United Nations General Assembly," Multivariate Behavioral Research, (April, 1971) Pp. 251-286.

13. Ibid., p. 270.

CHAPTER III

STUDY OF THE TWENTY-FIFTH SESSION

Introduction

The purpose of this study is to explore voting patterns in the United Nations General Assembly. Those voting patterns will aid in discovering the roles of nations in the international system and within the political process of the General Assembly itself.

The approach to be followed in this study of roll call voting patterns has derived much of its inspiration from the work of Hayward Alker and Bruce Russett. However, rather than replicating precisely the Alker-Russett study, this analysis will draw methodologically from a wide range of earlier works. Reference will be made to studies made by Pratt and Rummel; Newcombe, Ross, and Newcombe; and J. Vincent, as well as to Alker and Russett. An attempt will be made to tie into those previous studies, which had covered the years up to and including 1969. This research will analyze the twenty-fifth session of the General Assembly beginning in September 1970, thereby providing a means for diachronic comparison of some of the original theories that underlie national voting behavior.

When seeking information about the state of the inter-

national system, one may ask whether the apparent emergence of a multipolar system is due to a loosening of the ties to the United States and to the Soviet Union. Perhaps the older nations are just as tightly bound to East or West as ever, and the diffusion of power is due to the emerging anti-colonial states. In the early days of the United Nations, it was much easier to perceive alignments. Of the original 51 members, the United States could claim 35, the Soviet Union only 5, with 10 nations unaligned.[1] After 1955 when the superpowers finally agreed upon a package deal of 16 new states, the membership began to snowball. The sixties gave birth to many new nations which created a third world within the United Nations. In the year 1970 under study, the nation of Fiji was admitted to the U.N. just three days after its independence, bringing the total membership to 127.[2]

The growth of the membership of the third world nations should signal a new era in which the concerns are no longer primarily East-West. If this were true then perhaps the United Nations would be noticeablely less a cold war forum than in times past. As issues distinct from those of the cold war become important, the power of the cold war bloc leaders is likely to suffer. The decline of the strength of superpower influence could be measured by considering the effects of economic and military aid by the United States and Russia upon United Nations voting.

This study will look for voting alignments in the

General Assembly and attempt to discover which issue is most prominent. A form of factor analysis will be employed which will be described in a section explaining research method. The assignment of values to vote decisions differs from previous studies, though not dramatically. This research will also depart from previous studies in that nations will be compared in a more direct manner and possible determinants of vote decision examined.

Data Sources

This research is a secondary analysis, the roll call data used in this study being stored on computer tape and collected by the Consortium for Political Research, Ann Arbor, Michigan with Charles Wrigley as the principal investigator.[3] This data includes roll call votes from each nation since the inception of the United Nations in 1946, through the twenty-sixth session in 1971.

National attribute data was obtained from the World Handbook of Political and Social Indicators, which contains 494 economic, social, political, and geographic features of nations.[4]

Basic Analytic Techniques

Three analytic techniques were used in this analysis: Factor analysis; simple correlation; and multiple regression.

First, the voting data was factor analyzed to identify clusters of issues and to aid in data reduction. This is

necessary to give order to the data and to reduce the data to a form which can be subsequently manipulated. Factor scores were then calculated for each nation on the various clusters of issues to provide weights on which they could be compared to one another. Second, a cross-tabulation procedure yielded a number of correlation coefficients to test for a relationship between voting behavior and involvement in various groups. Third, a multiple regression was run to assess the impact of foreign and military aid on voting behavior.

Factor Analysis: A Clarification

Because of the undetermined interdependencies, entangled behaviors, and masses of qualitative and quantitative data, factor analysis has become a primary tool to uncover major social and international patterns in such fields as psychology and political science. Factor analysis performed by SPSS (Statistical Package for the Social Sciences), a standarized computer program, can handle 100 variables simultaneously while compensating for random error and invalidity. Its main purpose is to disentangle complex interrelationships and to identify their distinct regularities.

The greatest cost in using factor analysis is that few laymen or even social scientists find the results comprehensible because of the mathematical complexities. Therefore it becomes necessary to explain factor analysis with a

view towards orientation of the reader rather than the presentation of calculating algorithms. This will insure that the study will be understood and that the terminology will form no obstacles to that understanding. This section will clarify the role that factor analysis plays in this study. The methodology itself will be explained in a step-by-step manner in the analysis procedure section. The mathematical model is presented in the Appendix.

Addressing the problem at hand, the data consists of 127 nations and 51 roll call votes. Not all nations were present for all 51 votes. The method of factor analysis will eliminate those nations only for those votes on which it was considered missing and no others. There are about 127 x 51 or 6,477 pieces of information. Factor analysis addresses itself to the question: "What are the patterns of relationships among these data?"

The perspective from which an R-mode factor analysis views the data is a focus on the variation of characteristics, the characteristics of the nations being how they voted. For example, if a group of nations voted "yes" on Var1171 which reads:

> To adopt the draft resol. (A/8237) calling upon the government of Israel to immediately implement the recommendations of the special committee to investigate Israeli practices re human rights in occupied territories; to comply with the 1949 Geneva convention and the Universal Declaration of Human Rights; requesting the aforesaid special committee to continue its work and report thereon to the Secretary-General.

and the same nations voted "yes" on Var1157;

> To adopt resol. (A/8242) reaffirming the inalienable rights of the people of Oman to self-determination; urging the UK to implement fully assembly resol. 1514 (XV) and other relevant resolutions; recommending specialized agencies and other international organizations to study the possibilities of extending educational, technical, and health assistance to Oman.

then there would exist a recognizable mathematical regularity among these variables which delineates a pattern of variation. If many such votes can be found to form such a regularity in the data, then a issue cluster can be identified. The primary aim of this study during the factor analysis stage is to find whether a linear relationship of the data could be untangled into separate patterns. Each pattern would be a factor representing a distinct cluster of interrelated data. It then remains for the researcher to determine whether the results support pre-existing theoretical assumptions.

The factors themselves can then be used to test for the existence of and cohesion of groups of nations. The latter can be accomplished because factor analysis will provide weights called factor scores to employ for each characteristic when combining them into scales based upon the empirical relationships among those characteristics.

In summary, the purpose of factor analysis in this study is merely to transform a set of variables (votes) which are intercorrelated into a set of variables which are uncorrelated (factor scores).

Hypothesis Formulation

Most researchers who have studied United Nations roll call voting for the prupose of examining the behavior of nations have tended to avoid the formulation of a hypothesis. The difficulty lies in the subjective essence of factor analysis which finds the researcher in the dilemma of having to admit that having obtained the results of a factor analysis, he/she cannot lay claim to having established the only possible true relationships. Indeed, a valid criticism of any factor analysis would be that there is a subjective, almost intuitive element in evaluating the results.

However, if one first assumes certain relationships between variables, one must be able to justify those assumptions by means of a factor analysis. Therefore, it comes from the above statement that factor analysis can indeed perform the function of hypothesis testing.

Prior research sugests the following hypotheses:

1. The behavior of nations in the U.N. is such that alignments clearly differentiating the Soviet bloc and the Western powers can be recognized.

The importance of identifying and studying these voting alignments is to determine the cohesiveness of the groups. Individual members can be observed, thereby identifying deviant nations and the direction of their disagreement. This can aid in the prediction of future votes.

2. The cold war is no longer the most prominent issue before the General Assembly as it has been in times past.

The importance of determining and ranking the major issues before the General Assembly lies in what it may indicate concerning the state of world politics. Alker's previous study had detected subtle changes in the international system. The purpose of the second hypothesis is to tie into that study by postulating what trend the issues that have received the greatest attention from the U.N. have taken. If the trend exists, it may well be due to a shift away from the concerns that had preoccupied a primarily bi-polar world.

This study will also examine national membership in defense pacts, namely NATO (North Atlantic Treaty Organization) and WTO (Warsaw Treaty Organization) and how they compare to alignments in the General Assembly. The influence of the superpowers will also be examined by observing the effect of military and economic aid upon vote characteristics.

Operationalization

Fifty-one roll call votes were picked from the plenary session. Nation votes of yes, abstain, and no were coded as 1, 2, and 3, respectively. Only votes with less than 90 per cent of the total nations voting in agreement were included. That is, less than 90 per cent voted in any one category, yes, no, or abstain.

The factoring method used was principal factoring without iteration, (PA1). A variant of PA1, known as the principal component solution was decided upon because it employs

defined factors rather than using inferential assumptions. This allows for unities to be placed in the principal diagonal of the correlation matrix rather than having to estimate communalities. In sum, when data reduction is the objective unities are placed in the principal diagonal, which allows for the direct calculation of factor scores rather than relying upon estimates.

Analysis Procedure and Interpretation of Results

The factor analysis procedure begins with a correlation matrix. In this case, the fifty-one roll call votes are the variables, and in each cell is the product moment correlation coefficient. Those coefficients simply measure the degree of linear relationship between pairs of roll call votes. A value of one in the cell means that the votes are perfectly linearly correlated with one standarized unit change in one vote accompanied by a one unit change in the other vote. As the coefficient decreases to zero, so does the relationship. Because a vote's correlation with itself is unity, the principal diagonal contains a value of one. In sum, the purpose of this first step is to measure the extent to which all pairs of roll call votes are associated.

The matrix is factor analyzed which yields an unrotated factor matrix. See Table 3. Six factors were extracted because their eigenvalues were greater than unity. The eigenvalues are the sum of the squared loadings and are used to

measure the amount of variance accounted for by each pattern. See Table 4. If the eigenvalue is below unity (1), then that factor can explain less than one roll call vote and is automatically deleted. Table 4 also gives the percent of variance accounted for by each factor. Total variance is the percent of total variation among the roll call votes that is related to a factor pattern. Note that the six factors account for 81.8 per cent of the total variance. Of the six factors extracted, the last three account for variance percentages of only 3.2, 2.5, and 2.2, respectively, with only three roll calls loading as high as .65. The last three will therefore be considered idiosyncratic factors and together could explain less than four votes.

After extracting the initial factors, it is usually desirable to simplify the factor structure. This is done by using Kaiser's varimax technique, which rotates each factor until it defines a distinct cluster of interrelated votes. The rotated factor matrix is presented in Table 5. The fifty-one roll call votes are positioned along the left column, and are labeled Var1110 to Var1172. The roll call votes for the plenary session are found in the appendix. The matrix contains the loadings (α) which measure exactly which votes are involved in which factor pattern and to what degree. The sign of the loadings indicate the direction of the relationship. Examining those votes that did load heavily on factors will yield the substantive nature of

TABLE 3

UNROTATED FACTOR MATRIX

	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
VAR1110	-0.73846	0.44127	-0.11283	-0.08294
VAR1111	-0.74995	0.43675	-0.13107	-0.03089
VAR1112	0.75405	0.51982	-0.18727	-0.13843
VAR1113	0.56718	0.51062	-0.23291	0.46341
VAR1114	0.59294	0.51121	-0.23053	0.41760
VAR1115	-0.81064	-0.38203	0.08477	0.16458
VAR1116	0.67599	-0.10485	0.37735	0.10272
VAR1117	-0.73401	0.25220	-0.42638	0.00343
VAR1118	0.81486	0.02836	0.21756	-0.06904
VAR1119	-0.61939	0.30453	-0.33324	-0.15046
VAR1120	0.47508	-0.43954	0.36519	0.32343
VAR1121	-0.75446	0.20781	-0.11505	0.05739
VAR1122	0.81348	-0.15098	0.35382	-0.02921
VAR1123	0.77855	0.49322	-0.16066	-0.13904
VAR1124	0.49735	0.67893	0.11725	-0.29337
VAR1125	0.09450	-0.08397	0.08172	0.09179
VAR1126	0.49700	0.23843	-0.08912	-0.40000
VAR1127	-0.40173	0.63860	0.46497	-0.05938
VAR1128	-0.44012	0.61707	0.38224	-0.06547
VAR1129	-0.78787	0.37016	-0.20519	-0.07364
VAR1130	0.09755	-0.02114	-0.18477	0.19900
VAR1131	0.78218	-0.14328	0.41054	0.00704
VAR1132	0.77896	-0.16026	0.40308	0.02244
VAR1133	0.76720	-0.18357	0.36502	0.03217
VAR1134	0.22104	-0.25332	0.30871	0.40475
VAR1135	0.50646	0.51317	-0.20890	0.50293
VAR1136	0.57695	0.45571	-0.21216	0.35305
VAR1137	0.75474	0.55575	-0.21498	-0.06247
VAR1138	-0.70278	0.57830	0.11710	-0.00185
VAR1139	-0.68915	0.55722	0.20345	-0.01918
VAR1140	-0.71885	0.49082	0.16433	0.01199
VAR1141	-0.69594	0.52889	0.10530	-0.01202
VAR1142	-0.66491	0.55759	0.21319	-0.02105
VAR1143	-0.59152	0.44748	0.11040	0.01803
VAR1144	0.74976	0.17733	0.07715	0.02929
VAR1145	-0.75042	0.43625	-0.19495	0.04847
VAR1146	0.71691	0.57341	-0.19308	0.00802
VAR1147	0.03834	0.71760	0.08382	0.51372
VAR1148	0.23148	0.68756	0.24608	-0.49744
VAR1149	-0.36275	0.65055	0.35368	0.23983
VAR1150	-0.46827	0.60570	0.26370	-0.01114
VAR1151	0.78419	0.50375	-0.18785	-0.15625
VAR1152	0.73030	0.47210	-0.18750	-0.00484

TABLE 4

EXTRACTED FACTORS

Est. Communality	Factor	Eigenvalue	Pct of Var
1.0	1	25.33	49.7
1.0	2	9.46	18.6
1.0	3	2.90	5.7
1.0	4	1.61	3.2
1.0	5	1.28	2.5
1.0	6	1.11	2.2
1.0	7	.91	1.8

* The first three factors representa a cummulative percent of variance of 74.0. Note that after the sixth factor the eigenvalue drops below 1.0.

TABLE 5	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
VAR1110	-0.16021	0.73551	-0.43910	0.23772
VAR1111	-0.16353	0.73201	-0.45350	0.25263
VAR1112	0.93177	-0.12016	0.15182	-0.03052
VAR1113	0.79515	-0.01335	0.06179	-0.26809
VAR1114	0.81288	-0.03244	0.06719	-0.23785
VAR1115	-0.81071	0.24550	-0.20662	0.08087
VAR1116	0.26037	-0.17437	0.81382	-0.03485
VAR1117	-0.17982	0.37821	-0.78750	0.13172
VAR1118	0.47714	-0.36246	0.50957	-0.15440
VAR1119	-0.09616	0.42806	-0.51906	0.58462
VAR1120	-0.10875	-0.44458	0.48934	-0.61844
VAR1121	-0.31183	0.54596	-0.43942	0.19380
VAR1122	0.34685	-0.37608	0.78164	-0.02345
VAR1123	0.90443	-0.14374	0.19471	0.00098
VAR1124	0.78848	0.16983	0.11459	-0.19740
VAR1129	-0.20965	0.67720	-0.49205	0.34136
VAR1131	0.29450	-0.33653	0.81313	-0.02406
VAR1132	0.28732	-0.37513	0.76973	-0.12917
VAR1133	0.29360	-0.34648	0.80795	-0.01834
VAR1134	-0.15635	-0.06978	0.60985	0.06680
VAR1137	0.95342	-0.12651	0.10683	-0.05028
VAR1138	-0.09467	0.90825	-0.25662	0.03847
VAR1139	-0.12381	0.92414	-0.18633	-0.04438
VAR1140	-0.17538	0.88848	-0.18819	0.04384
VAR1141	-0.12187	0.88053	-0.22765	0.04082
VAR1142	-0.11552	0.89167	-0.20286	-0.09413
VAR1143	-0.09746	0.83132	-0.10827	0.01611
VAR1144	0.57749	-0.20218	0.45223	-0.01067
VAR1145	-0.13628	0.73264	-0.48319	0.14900
VAR1146	0.92227	-0.02345	0.21389	0.07586
VAR1148	0.56119	0.33420	0.06509	0.05327
VAR1149	0.06327	0.73262	-0.08019	-0.22434
VAR1150	-0.00000	0.74648	-0.14947	0.05415
VAR1151	0.93513	-0.16910	0.14985	0.00496
VAR1152	0.85958	-0.15878	0.11022	-0.04042
VAR1153	-0.55867	0.39155	-0.43588	-0.09922
VAR1154	0.88410	-0.11490	0.24494	0.12992
VAR1155	0.90138	-0.16805	0.17465	-0.02524
VAR1157	0.69542	-0.23127	0.39997	0.21384
VAR1160	0.82565	-0.13291	-0.02535	-0.13314
VAR1161	0.58586	-0.25468	0.31741	-0.08278
VAR1162	0.89581	-0.12282	0.21704	0.00907
VAR1163	0.78737	-0.21177	0.26293	0.20030
VAR1164	0.82476	-0.14493	0.19900	0.15606
VAR1166	0.54670	-0.03486	0.08625	-0.21163
VAR1167	0.29703	-0.60290	0.46448	-0.27193
VAR1168	-0.30308	0.62792	-0.38085	0.22137
VAR1169	-0.31890	0.63110	-0.43522	0.23761
VAR1170	0.31869	-0.50881	0.57278	-0.05419
VAR1171	0.59202	-0.28846	0.40575	-0.02714
VAR1172	0.18160	-0.30606	0.84603	-0.07572

those factors. Table 6 gives the votes that did load heavily on the first three factors. The substance and the loading of the roll call votes are also given.

It can be readily seen that factor one deals primarily with questions concerning the situations in Rhodesia and S. Africa. Roll call Var1114 was a resolution sponsored by 52 states and introduced on October 8 by Somalia:

> To adopt the draft resol. (A/8106) calling upon all states to take immediate steps to implement the provisions of Security Council resol. 282 (1970) regarding the strengthening of the arms embargo against South Africa and requesting the Secretary-General to report thereon to the General Assembly by Dec. 10, 1970.

The draft resolution passed in plenary on October 13 by a vote of 96 to 1, with 9 abstentions. Six other draft resolutions concerning S. Africa were introduced and passed, with the U.S. voting abstain on three, voting for two, and against one. The resolution which the U.S. opposed was Var1137 which was somewhat extreme in its condemnation of S. Africa.

Because ten of the votes that loaded heavily upon this factor concern Africa, this factor dimension can be labeled "Intervention in Africa."

Factor two, at first blush, could be labeled "human rights" because of the many references to racial intolerance and rights of humans and prisoners in armed conflict. However, roll calls dealing with human rights in Africa did not even moderately load on this factor. Therefore factor two must have a deeper meaning. During 1970, the United States

TABLE 6

MAJOR ROLL CALL LOADINGS
OF THE ROTATED FACTOR MATRIX (5)

FACTOR 1	
.81	South Africa condemnation
.93	Independence of Colonial Nations
.79	Arms embargo of S. Africa
.90	End Illegal Regime in Rhodesia
.95	Condemn Bantustans
.92	S. African Involvement in Nambia
.93	Condemn colonial Exploitation
.88	Portugese Territory
.90	Discontinuation of Collaboration with S. Africa
.89	Withdraw assistance to Portugal, S. Africa, Rhodesia
.82	Allow people to decide own Status
FACTOR 2	
.67	Continue UNCURK
.73	U.N. Objectives in Korea
.73	Korea
.54	Condemn Racism
.67	Elimination of Racial Discrimination
.90	Korea U.N. Forces
.88	Human rights in Armed Conflict
.87	" " " " "
.92	Prisoners of War
.83	Human rights in Armed Conflict
.62	Racial Intolerance
.60	Nazism
.61	Racial Intolerance
FACTOR 3	
.81	Rights of Palestinians
.78	Middle East Ceasefire
.80	Palestine
.60	Israel return Of Land
.57	Israel Occupied Territories

was still involved in an armed conflict, the Vietnam War. There are several references to armed conflict in the roll call votes that loaded heavily upon factor 2. Following is an example:

> To adopt the Draft Resol. (A/8178) condemning actions of countries conducting aggressive wars in violation of the UN charter and the 1925 Geneva protocol and 1949 Geneva Convention; Recognizing the need for additional instruments for the protection of civilian populations. . .

The Soviet Union voted "yes" and the United States, "Abstain." Any reference to armed conflict might be "milking" the U.S. presence in Indochina and hence serve the cause of the cold war.

Roll calls concerning the unification of Korea and elimination of racial discrimination also loaded upon factor 2. Reference the Russett study, it can be found that in years prior those issues were instruments of the Cold War.

An examination of the nature of the roll calls concerning Korea exemplifies their use as Cold War weapons. Var1110 which reads:

> To adopt the proposal for the inclusion of sub-item (c), the report of the UNCURK - In the agenda (A/8100);

and Var1111 which reads:

To retain the Title, "Question of Korea" (A/8100).

were both attempts by the Soviet Union to delete the UNCURK (United Nations Commission for the Unification and Reconstruction of Korea) report item by requesting separate votes on

the sub-item and on the main title. These were defeated by votes of 72 for to 24 against, with 15 abstentions, and 71 for, to 24 against, with 16 abstentions, respectively.

Varl129, co-sponsored by the United States, was adopted in the plenary session by a vote of 67 to 28, with 22 abstentions, and affirmed the mandate of UNCURK and the continuing role of the United Nations in Korea:

> To adopt the draft resol. (A/8185) reaffirming UN objectives in Korea, requesting the UNCURK to continue its work and noting that the greater part of the UN forces have already withdrawn from Korea.

From the above arguments, factor two has been labeled "Cold War."

Factor three is without doubt the question of Palestine and the Middle East situation. Varl116 was a draft resolution submitted by 21 Afro-Asian states and Yugoslavia which was adopted by a bote of 57 to 16, with 39 nations abstaining. The United States and Israel opposed the resolution and the Arab nations were split with seven states voting for the Afro-Asian draft and seven not participating. Varl17 which also loaded heavily upon this factor was a Latin American draft resolution which asked for a greater U.N. committment:

> To adopt the draft resol. (A/1694) requesting the parties concerned (in the Middle East Question) to resume discussion with the Secretary-General's special representative in the Middle East; Recommending scrupulous observance and extention of cease-fire, with the addition of measures for its observance including, if possible, use of UN observers now in the region.

That resolution was rejected by a roll call vote of 45 to 49, with 27 abstentions. Israel and the U.S. were on the losing end with the Soviets and all 14 Arab nations opposing the draft. Varl133 was a controversial proposal which recognized that the people of Palestine were entitled to equal rights and self-determination. Furthermore, it made this an indispensable element in the establishment of peace in the Middle East. Fifty nations abstained from that vote which passed by a vote of 47 to 22. The United States and Israel were once again defeated. The two remaining votes that loaded upon factor three were condemnation of Israeli occupation of Arab territory. Factor three was therefore labeled the "Middle East question."

The study of Alker and Russett (1965) will help to illustrate the trend of the major issues that concern the United Nations. From Table 1 in the Prior Research section of this report, note those issues which were identified for the years: 1949; 1952; 1957; 1961; and 1963. The cold war dimension has always vied for a top position with self-determination, and was even combined with that dimension for the first year of the study. In 1963, the last year of the Alker Russett study, Self-determination all but disappeared giving way to intervention in Africa. The Palestine question was often a burning issue but subsided in 1963.

The three factors identified in the 25th session were Intervention in Africa, Cold War, and the Middle East Question.

The ranking of these rotated factor patterns can be done by examining their respective percentages of total variance. This is done by squaring each loading in the columns of the rotated factor matrix, Table 5, summing those squared loadings and dividing by the total number of votes. This results in the factor, Intervention in Africa, having a total variance of 30.7 per cent. The Cold War issue explains 20.8 per cent of the variance and the Middle East, 19.3 per cent.

The next step in the research design is to obtain the factor scores of each nation on the three principal factors. This is done by summation of the factor loadings of each roll call vote multiplied by the nation's vote value, (1, 2, or 3) minus the mean of that vote divided by the standard deviation of the vote. Table 7 gives the factor score matrix which is used to calculate the scores for each nation. The factor scores can be considered composite indices for each nation and will be used to compare the nations on the issue patterns. It is important to remember that factor scores are standardized, which means that they have a mean of zero and most of the values lie between $\pm$ 1. Scores higher than 1 or lower than -1 can be considered unusually high or low.

Table 8 summarizes those nations that load heavily upon the first three factors, and identifies the voting alignments within the General Assembly. The Soviet and Western Groups are plainly evident which confirms the first

TABLE 7	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
VAR1110	0.00103	0.05762	-0.00723	0.09295
VAR1111	0.00309	0.05483	-0.00808	0.10297
VAR1112	0.07872	0.00204	-0.02233	-0.01074
VAR1113	0.10211	0.03046	-0.04203	-0.17665
VAR1114	0.10056.	0.02573	-0.04227	-0.15446
VAR1115	-0.04118	0.01368	0.04951	0.03666
VAR1116	-0.01942	0.07496	0.17531	0.07509
VAR1117	0.03537	-0.03722	-0.13815	-0.00056
VAR1118	-0.01177	0.00580	0.02024	-0.04877
VAR1119	0.01976	-0.02002	-0.01615	0.35320
VAR1120	-0.02932	0.01735	0.01555	-0.37243
VAR1121	0.00878	0.03118	-0.00440	0.07620
VAR1122	-0.01000	0.03462	0.14767	0.07811
VAR1123	0.06704	0.00071	-0.01633	0.01775
VAR1124	0.04770	0.04704	-0.01589	-0.16656
VAR1129	0.00921	0.03758	-0.00231	0.16790
VAR1131	-0.02258	0.04362	0.15838	0.08162
VAR1132	-0.01549	0.03705	0.13888	0.00026
VAR1133	-0.00752	0.04446	0.16871	0.09154
VAR1134	-0.02800	0.06878	0.16937	0.14372
VAR1137	0.08286	-0.00294	-0.04180	-0.02799
VAR1138	0.00958	0.11968	0.05554	-0.04571
VAR1139	0.00154	0.13380	0.07035	-0.10272
VAR1140	0.00294	0.12468	0.08302	-0.03296
VAR1141	0.00991	0.11834	0.06983	-0.04100
VAR1142	-0.00098	0.12765	0.05277	-0.14153
VAR1143	0.00891	0.12733	0.09230	-0.04071
VAR1144	0.00873	0.02278	0.03448	0.05081
VAR1145	0.02447	0.05998	-0.01374	0.02861
VAR1146	0.07935	0.02259	0.02021	0.07352
VAR1148	0.00433	0.05022	0.01046	-0.00307
VAR1149	-0.00466	0.12352	0.01486	-0.20967
VAR1150	-0.01668	0.10000	0.03115	-0.02100
VAR1151	0.07341	-0.00907	-0.03121	0.01677
VAR1152	0.06329	-0.00874	-0.05762	-0.01370
VAR1153	-0.01437	0.01990	-0.04683	-0.12582
VAR1154	0.06664	0.00865	0.01101	0.12577
VAR1155	0.06507	-0.00364	-0.03653	0.00185
VAR1157	0.02955	-0.00206	0.06189	0.19782
VAR1160	0.08180	-0.01507	-0.08141	-0.09779
VAR1161	0.02171	-0.00085	-0.00130	-0.02191
VAR1162	0.06547	0.00712	-0.00792	0.02683
VAR1163	0.04696	-0.01537	0.02604	0.16835
VAR1164	0.05934	-0.00880	0.01555	0.12606
VAR1166	0.06116	0.01884	-0.01660	-0.14787
VAR1167	-0.01359	-0.03456	-0.00517	-0.12910
VAR1168	0.00838	0.05100	0.02707	0.09821
VAR1169	0.00912	0.04383	0.01492	0.10387
VAR1170	-0.00850	-0.01242	0.06130	0.04582
VAR1171	0.00211	0.00045	0.00228	0.03221
VAR1172	-0.01861	0.05965	0.18036	0.05608

TABLE 8

NATIONS ARRANGED UNDER FACTOR BY FACTOR SCORE

FACTOR 1	FACTOR 2	FACTOR 3
3. United States *	2. Cuba**	Guatemala
2. Canada *	2. Poland**	El Salvador
3. United Kingdom *	3. Hungary**	Nicaragua
2. Belgium *	3. Czechoslovakia**	Costa Rica
2. Luxemburg *	3. Bulgaria **	Panama
3. France *	2. Romania**	Uruguay
2. Italy *	3. U.S.S.R.**	Iceland
2. Australia	3. Mongolia	Burundi
2. New Zealand		Botswana
		Lebanon
		Israel
		Pakistan
		Thailand
		Indonesia

* NATO countries Those missing: Denmark, Norway, Netherlands, Portugal Greece

** WTO countries Those missing: Yugoslavia

hypothesis. To determine the degree to which either side has formed a unified front, these alignments will be compared directly against NATO and WTO. Though the groupings look the same, the method of comparison will account for nations that are not members of those defense pacts.

The first method employed was a cross-tabulation which gives the percentages and frequencies of the two defense pacts by the magnitude of the factor scores on factor one and factor two. The cross-tabulations are reproduced in Tables 9 and 10. Each nation which is a member of NATO was recoded into group 1 and nations that are members of WTO were recoded into group 2. The Gamma coefficients which assess the relationship between the defense pacts and the factor scores on patterns one and two, were 1.0 and .96, respectively.

In addition, a T-test of significance was run with nations not belonging to either group categorized into group three. The purpose of this was to determine the significance of belonging to a defense pact with other nations serving as control. The results are shown in Table 11. By using the T values of 3.37 and 7.10, with 20 degrees of freedom, and finding the results in a t distribution table, the probability of such a chance occurence are indeed rare, on the order of one in ten thousand.

The above correlation of defense pacts with the issue factors indicates the intense opposition between the Soviet bloc and the Western powers. Table 12 illustrates

TABLE 9

TABLE 9. CROSSTABULATION OF ALLIANCES BY FSCORE 1

		FSCORE 1 Values				
		0	1	2	3	Row Total
NATO	(1)	3 21.4 27.3 13.6	7 50.0 100.0 31.8	1 7.1 100.0 4.5	3 21.4 100.0 13.6	14 63.6
WTO	(2)	8 100.0 72.7 36.4	.0 .0 .0 .0	.0 .0 .0 .0	.0 .0 .0 .0	8 36.4
Column Total		11 50.0	7 31.8	1 4.5	3 13.6	22 100.0

Pearson's R = -0.60134 Significance = 0.0015 Gamma = -1.0

TABLE 10

TABLE 10 CROSSTABULATION OF ALLIANCE BY FSCORE 2

		FSCORE 2 Values			
		0	1	2	Row Totals
NATO	(1)	12	2	0	14
		85.7	14.3	0.0	63.6
		92.3	100.0	0.0	
		54.5	9.1	0.0	
WTO	(2)	1	0	7	8
		12.5	.0	87.5	36.4
		7.7	.0	100.0	
		4.5	.0	31.8	
Column Total		13	2	7	22
		59.1	9.1	31.8	100.0

Pearson's R = 0.84620 Significance = .0000 Gamma = .96

TABLE 11

T-TEST OF ALLIANCE MEMBERSHIP

VARIABLE	NUMBER OF CASES	MEAN	STANDARD DEVIATION	STANDARD ERROR
Fscore1				
Group 1	14	1.2857	1.069	0.286
Group 2	8	0.0	0.0	0.0
Fscore2				
Group 1	14	0.1429	0.363	0.097
Group 2	8	1.7500	0.707	0.250
Fscore3				
Group 1	14	0.0714	0.730	0.195
Group 2	8	-0.1250	0.354	0.125

POOLED VARIANCE ESTIMATE			SEPARATE VARIANCE ESTIMATE		
T Value	Degrees of Freedom	2-tail Prob.	T Value	Degrees of Freedom	2-tail Prob.
3.37	20	0.003	4.50	13	0.001
-7.10	20	0.000	-5.99	9.16	0.000
0.71	20	0.486	0.85	19.70	0.407

TABLE 12. U.S. VOTE RECORD VS. SOVIET UNION

Roll Calls	United States	Soviet Union
Var1110	yes	no
Var1111	yes	no
Var1112	no	yes
Var1113	abstain	yes
Var1114	abstain	yes
Var1115	yes	no
Var1116	no	yes
Var1117	yes	no
Var1118	no	yes
Var1119	yes	no
Var1120	no	yes
Var1121	yes	no
Var1122	no	yes
Var1123	no	yes
Var1124	no	abstain
Var1129	yes	no
Var1131	no	yes
Var1132	no	yes
Var1133	no	yes
Var1134	yes	yes
Var1137	no	yes
Var1138	yes	no
Var1139	yes	no
Var1140	yes	no
Var1141	yes	no
Var1142	yes	no
Var1143	yes	abstain
Var1144	abstain	yes
Var1145	yes	no
Var1146	no	yes
Var1148	no	no
Var1149	yes	abstain
Var1150	yes	no
Var1151	no	yes
Var1152	no	yes
Var1153	yes	no
Var1154	abstain	yes
Var1155	no	yes
Var1157	no	yes
Var1160	abstain	yes
Var1161	abstain	yes
Var1162	no	yes
Var1163	no	yes
Var1164	abstain	yes
Var1166	abstain	yes
Var1167	no	yes
Var1168	yes	abstain
Var1169	yes	abstain
Var1170	no	yes
Var1171	abstain	yes
Var1172	no	yes

the voting record of the United States versus that of the Soviet Union. The U.S. and the Soviets agreed in only one instance, Varll34. The superpowers, even if they can count on the support of their own bloc of developed nations, need either the support of the third world nations or at least their benevolent neutrality. One logical method to court new allies is to give aid to those nations. The Arabs have been accused of unabashedly buying support in the U.N. with petrodollars. Economic and military aid from the superpowers is much less direct a method but perhaps the influence of that aid may have a bearing upon vote outcome.

This study proposes to use direct measurements of Soviet aid from 1954 through 1965 and United States' economic and military aid from 1958 through 1965 to gauge the degree to which the superpowers can influence voting behavior through aid. In any multivariate analysis, the challenge of exactly how to measure the indicators arises. Environmental variables which measure interaction of a diplomatic nature in international organizations and in foreign capitals will serve as control. The purpose of these indicators is to measure the possible influence of direct communication links to governments and the exertion of influence upon U.N. voting through those channels.

The method chosen is multiple regression which will evaluate and measure the overall dependence of the national scores upon the environmental independent variables.

The multiple regression will predict the factor scores for factor one and then for factor two as the dependent variables with the independent variables being membership in a defense pact, Soviet aid total, Soviet aid per capita, U.S. econ aid total, U.S. econ aid per cap., U.S. Military aid total, U.S. Military aid per cap., membership in U.N. organizations, membership in international organizations, and total diplomatic representation abroad. The results are complied in Tables 13 and 14.

The null hypothesis for the regression analysis will be that there is no linear relationship between the dependent variable, Factor scores, and the independent variables.

The purpose of the regression analysis is to find the best linear prediction equation. The procedure will calculate an equation of the form:

$$Y' = A + B_1X_1 + B_2X_2 + \ldots + B_kX_k$$

where Y' represents the estimated value for Y, A is the Y intercept, and B_n are regression coefficients. Also statistics are obtained which will indicate how accurate the prediction equation is and how much variation in Factor score is accounted for by the combined linear impact of the independent variables.

From Table 13 and 14 the value for R^2 is .38 for Facscore 1 and .52 for Facscore 2. This indicates the percentage of the variation in the dependent variable explained by

TABLE 13

REGRESSION OF FACSCORE 1

Multiple R	0.61415
R^2	0.37718
Standard Error	0.67882

Independent variables	B	Beta
Var260	.00549	.45438
Var002	.37604	.68050
Var251	.00000	- .83353
Var252	.00596	.32335
Var253	.00061	1.55244
Var254	.00209	.08246
Var255	.00087	- 1.87302
Var257	.04719	- .04098
Var258	.00811	.08936
Constant	.10217	

Overall F Test	DF	Sum of Sq	Mean Sq	F
Regression	9.	23.9993	2.666	5.78
Residual	86.	39.6282	0.461	

TABLE 14

REGRESSION OF FACSCORE 2

Multiple R	0.72040
R^2	0.51897
Standard Error	0.43088

Independent Variables	B	Beta
Var260	.00349	.24083
Var002	.23869	.37426
Var251	.00000	.27594
Var252	.00378	.07056
Var253	.00039	.17921
Var254	.00133	- .07524
Var255	.00055	- .18225
Var257	.02995	- .18451
Var258	.00515	- .39448
Constant	1.11693	

Overall F Test	DF	Sum of Sq.	Mean Sq.	F
Regression	9.	17.226	1.914	10.3
Residual	86.	15.966	0.185	

the dependent variable. That is there is a proportional reduction in error of 38 and 52 per cent when one shifts from a prediction model using the mean of Facscore 1 and 2 in predicting their values as opposed to using the best fitting least-squares regression line. The value of the Pearson's r is positive for Soviet aid and Facscore two which indicates a positive relationship. The negative value between U.S. aid and Facscore 1 indicates an inverse relationship.

Beyond the description of direction and strength of the linear equation, the values of A and B_n can be substituted to obtain a linear prediction equation:

$$Y' = .10 + (.016)\ \text{Dip. Missions} + (1.4)\ \text{Def. Pact} + (-.0001)\ \text{Sov. Aid Tot.} + (.014)\ \text{Sov. Aid/Cap} + (.0023)\ \text{U.S. Aid Tot.} + (.001)\ \text{U.S. Aid/Cap} + (-.0037)\ \text{U.S. Mil. Aid} + (.016)\ \text{U.N. Organs} + (.0044)\ \text{International Org.}$$

Where Y' would be a predicted facscore 1 based on data. Note that U.S. mil aid/cap was dropped because its tolerence was too low.

A similar prediction model can be obtained for Facscore 2.

The standard error of Facscore 2 estimate is .43 meaning that the predicted score using such an equation will deviate from the actual score by .43 units.

To directly compare the influence of each independent variable upon Facscore, the standarized regression coefficients are examined. Notice the Betas in Table 7. The greatest relative contribution was made by U.S. mil. Aid,

and U.S. economic aid. Soviet aid is negative as would be expected, however U.S. economic aid is positive while military aid if negative. The results indicate that Soviet aid to nations other than those loading heavily upon factor one (NATO and friends) serves to unify those nations. U.S. economic aid seems to positively affect voting behavior, but U.S. military aid seems to have a negative effect upon the unification of the West. This also has a tendency to cancel out the positive effect of economic aid. The explanation for this effect could possibly be attributed to the U.S. involvement in Vietnam and the great amount of military aid expenditures in that area.

An evaluation of the standarized regression coeffi-cients indicates that economic military aid by the superpowers is a factor in vote patterns although not necessarily a positive one.

To examine whether the null hypothesis has been rejected, the overall F test will be employed. The degrees of freedom for the F test are 9 over 86 for Fascore 1 and Fascore 2. The values of F (again from Tables 13 and 14) are 5.78 and 10.31, respectively. By refering to a table for F values it can be found that the significance level is .001 for both. The overall null hypothesis would require that multiple R be equal or close to zero, which is not the case. Therefore we can confidentaly reject the null hypothesis, H_o.

CONCLUSIONS

Much previous research has been done on United Nations voting and has helped to pave the way for this analysis. The findings in this study confirm the hypotheses postulated and have been in keeping with those of other, similar studies. It has been found that there has been a shift in emphasis in the twenty-fifth session. The greatest emphasis seems to have been upon Rhodesia and S. Africa which made up almost a third of the variance (32.7). The Western powers seem most concerned with those developments. The cold war factor made up a little over a fifth of the variation, the Soviet bloc being oriented into that pattern. The remainder of the pertinent dimensions was concerned with the Middle East situation. This represents a change in the priority of the interests of nations in general. For comparison, the Russett study obtained the following factors which are given in descending order of importance for the 18th session: Cold War; Intervention in Africa; Suprantionalism; Palestine; and Self-determination.

It has been established that membership in NATO and WTO results in similar voting patterns. Possible future research could entail the ranking of the nations within these defense pacts.

The question of superpower aid, both economic and

military, could only superficially be examined as data on military aid by the U.S.S.R. was not available. Also current expenditures were not available, however, a history of economic aid often serves as well as current aid since a time lag in all probability occurs between giving aid and receiving dividends. Future research could test for the possibility of such a time lag effect.

The above may give rise to questions of validity. Validity must always be noted whenever measurement is indirect as is often the case in the social sciences. Content validity entails the investigator's subjective assessment that the indicators do indeed evaluate the desired properties. Most of the indicators are unidimensional and measure one specific property. Missing values caused at most only 15% or less of the cases (nations) to be missing for the calculation of the regression equations. Rather than relying entirely upon subjective evaluation it has been ascertained that a number of specialists have also concurred by obtaining similar findings. (it was noted previously that prior research has been conducted with similar indicators if not with the same data base.)

In summary, some characteristics of nations such as nationalism, ideology, democracy are very much related to United Nations voting yet are not directly measurable. Those characteristics are the result of complex interaction

various social, economic, and political variables. The compromise that the social scientist must make at this time is to find those group factors related to voting and to assess the nations accordingly.

NOTES

1. John G. Stoessinger, The United Nations and the Superpowers: China, Russia, and America (New York: Random House, 1977) p. 27.

2. U.S. President, Participation in the UN: Report by the President to the Congress for the Year 1970 Sept 71.

3. Charles Wrigley,(Principal Investigator), United Nations Roll Calls, Vol. 1 First ICPR ed., (Ann Arbor: 1971).

4. Charles L. Taylor, and Michael C. Hudson, World Handbook of Political and Social Indicators (London: Yale University Press, 1972).

CHAPTER IV

FURTHER INQUIRY

Evaluation of the Original Study

This evaluation of the study of the twenty-fifth session of the General Assembly is not designed to be destructive, but rather to serve as a basis for further inquiry.

An idea that a Cold War alignment is paramount in all voting in the United Nations would necessitate that all the roll call votes be highly related to one another. Most authorities on U.N. affairs would agree however, that there are at least two distinct alignments that dominate most of the issues that concern the General Assembly. Ernst Haas describes U.N. politics as a balance between the Cold War and the demands of the less developed countries. This balance does not predispose a totally unrelated set of concerns but advances the possibility of mutual concern.

The method used in the study of the twenty-fifth session causes the major issue dimensions to be totally unrelated. This may not be warrented since the world is being treated as though phenomenon conform to totally unrelated clusters or patterns. The decision to impose this condition, known as orthogonality, will be examined thoroughly in an upcoming section dealing with that conceptual problem.

Another conceptual problem was created when only plenary votes were included in the initial study. The General Assembly also has seven main committees as follows: First (Political and Security); Second (Economic and Financial); Third (Social, Humanitarian, and Cultural); Fourth (Trusteeship and Non-Self Governing Territories); Fifth (Administrative and Budgetary); Sixth (Legal); and the Special Political committee. Roll call votes occur in those committees as well as in the plenary session. Whether or not those votes belong in the consideration of important issues and alignments will be investigated in the section on committee votes.

The operationalization of the vote values gives rise to questions concerning what a nation really means when it abstains from voting. The study presumed neutrality on the part of a nation concerning a particular roll call on which it had abstained from voting. The nation may have voted in that manner yet may have had a stance other than neutral. That question, as well as the possibility of weighting an abstention, will be discussed in a section on weighted vote values.

Finally, the regression equation approach originally used to measure environmental effects may have simplified the causal factors to such a degree that unknown influences may have been overlooked. That regression-equation question will be taken up in a section so named.

Oblique Rotation

Rotation is usually necessary to simplify the factor pattern. Figure 1 illustrates clearly what this procedure attempts to do. Not all factor analyses obtain such a simple structure:

> It remains true that three-fourths of published factor analyses are demonstratably nowhere near simple structures (editors having no standards or resources to check this) and constitute no contribution (except confusion) to the field that they are intended to clarify. What these casual and unworkmanlike studies have actually done in the last decade is to create an atmosphere of pointlessness and disillusionment by cumulating the junk heap in which factors can rarely be matched from any one research to another.[1]

The decision to use an orthogonal rotation makes an a priori assumption that the clusters of relationships (issues) are uncorrelated. The patterns are then defined in that manner. Should the separate clusters of issues be in fact correlated, the orthogonal factors will be unable to align properly and the discrimination becomes less clear. Orthogonal factors are very much easier to communicate and are subject to simplier methods of mathematical analysis. However, those would not present valid justifications for its use.

Because most studies set forth an explanation of the method chosen and not those discarded, there being enough methodology to explain, they are immediately suspect. One author launched just such an attack on Russett's work.

FIGURE 1

SIMPLE STRUCTURE TYPE OF MATRIX

Roll Call Votes	UNROTATED FACTORS			SIMPLE STRUCTURE		
	F_1	F_2	F_3	F_1	F_2	F_3
1	X	X		X		
2	X	X	X	X		
3	X	X	X	X	X	
4	X		X		X	
5	X	X			X	
6	X	X			X	X
7	X		X			X

X are Hypothetical high Loadings

This table from R.J. Rummel, "Understanding Factor Analysis." JCR, 11 (December, 1967), P475.

* Note that in the unrotated factors, the greatest number of roll calls load on the first factor, then the second, and so on. After rotation to simple structure, the roll calls form clusters which make the determination of the substantive nature of each factor possible.

His complaint follows:

> Of course it is possible to assign a single set of criteria, based on grounds of mathematical and statistical elegance and parsimony, and to seize upon the first factor solution that pops out of the machinery as the most likely approximation to truth. This ploy, widely adopted by political scientists including, apparently, Professor Russett, has the advantage of reducing the paperwork. The profound arbitrariness of this approach however must be duly appreciated.[2]

Professor Russett answered this charge as follows:

> The caution against accepting any one analytic solution as completely satisfactory before seeing others, including various oblique rotations, is perhaps the best-grounded. To discuss the matter experimentally rather than hypothetically, I did also perform some oblique rotations, but they did not change the basic pattern nor affect the grouping decision in more than a half dozen of the most marginal countries, and were not reported in the article.[3]

Of the studies that were previously cited which had performed a factor analysis upon United Nations voting, all had relied upon the varimax method of rotation. Only one author managed to sufficiently justify its use through a rather tedious discussion of factor analysis. He emphasised that the role factor analysis played in his study was one of data reduction:

> The second approach-and the one employed in this study-is to use factor analysis to transform a set of variables which are intercorrelated into a set of variables which are uncorrelated. Because the latter variable, called factor scores, are usually far fewer in number than the original variables, this second use of factor analysis may be referred to as "Data Reduction." The factor scores have a tremendous advantage over the original variable scores in that, within each group, such scores are mutually orthogonal to each other.[4]

That author used the Alker and Russett (1965) voting pattern data in a direct correlation with a factor analysis of national attribute data.

Therefore, there seems to be some evidence that if the study is primarily concerned with comparing nations on factor scores, then orthogonal rotation is justified. The question remains, "When should an oblique rotation be performed?" The answer must be that it should always be attempted expecially if the researcher is primarily concerned with causes of the patterns. A need for oblique rotation may be indicated if there are a large number of votes which load moderately on several factors.

Following the above logic, an oblique rotation was performed on the six extracted factors from the original study. Five separate oblique rotations were performed, ranging from less oblique (nearly orthogonal) to fairly oblique, to extremely oblique. Each rotation produced two matrices, a factor pattern and a factor structure matrix. The factor pattern matrix gives the loadings of each roll call vote on the factors. The essence of each factor is determined as in the varimax solution. The nature of the votes determines the label of each factor pattern. Because the condition of orthogonality has been relaxed, the votes load much more heavily upon the resultant factors which facilitates the interpretation. Table 15 contains the factor pattern matrix. Table 16 gives the loadings as well as the

ASSEMBLY RCLL CALL ANALYSIS

FILE NONAME (CREATICN CATE = 06/3C/78) TABLE 15

AFTER ROTATICN WITH KAISER NORMALIZATICN

FACTCR PATTERN

	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
VAR1110	-0.30665	-0.08902	0.51356	-0.08328
VAR1111	-0.31178	-0.09741	0.50632	-0.07544
VAR1112	0.09021	0.22473	-0.02853	0.80086
VAR1113	-0.04902	-0.31239	0.09091	1.04813
VAR1114	-0.04252	-0.27900	0.06218	1.03280
VAR1115	-0.00604	-0.21994	0.23521	-0.55578
VAR1116	0.84270	-0.11401	0.08036	0.05850
VAR1117	-0.75440	-0.15060	0.09002	0.11373
VAR1118	0.29718	0.14608	-0.26902	0.15442
VAR1119	-0.27262	-0.03838	0.13584	-0.05346
VAR1120	0.24070	-0.13843	-0.16651	-0.04236
VAR1121	-0.26282	-0.18953	0.39652	-0.08447
VAR1122	0.80568	0.09648	-0.08957	0.08885
VAR1123	0.11807	0.22561	-0.07455	0.71908
VAR1124	0.03621	0.56438	0.31595	0.53063
VAR1129	-0.28777	-0.10846	0.45159	-0.08372
VAR1131	0.83309	0.11614	-0.05684	-0.00634
VAR1132	0.77032	0.16383	-0.05257	0.03746
VAR1133	0.87229	-0.00297	-0.03762	0.10046
VAR1134	0.69435	-0.59816	0.05357	-0.08337
VAR1137	0.01276	0.17469	-0.06452	0.84908
VAR1138	-0.06445	0.01272	0.89047	0.01771
VAR1139	-0.00032	0.08646	0.96641	-0.03719
VAR1140	0.04540	0.01519	0.91777	-0.05690
VAR1141	0.00110	0.06208	0.90692	-0.00665
VAR1142	-0.05699	0.13294	0.93059	-0.04817
VAR1143	0.11559	-0.01067	0.89596	0.02279
VAR1144	0.30182	-0.05811	-0.17671	0.33247
VAR1145	-0.32985	-0.19330	0.56768	0.09637
VAR1146	0.22639	0.12308	0.06719	0.80472
VAR1148	0.05103	0.70501	0.35456	0.10943
VAR1149	-0.13208	-0.05836	0.70907	0.08956
VAR1150	-0.09450	0.12112	0.64945	-0.10996
VAR1151	0.06656	0.23481	-0.11210	0.76276
VAR1152	-0.06067	0.03452	-0.18675	0.73398
VAR1153	-0.40865	-0.30022	0.27091	-0.23422
VAR1154	0.20339	-0.00600	-0.10105	0.73785
VAR1155	0.03893	0.11179	-0.14544	0.74061
VAR1157	0.43257	0.29654	-0.14110	0.35916
VAR1160	-0.17002	0.06438	-0.11395	0.82789
VAR1161	0.17760	0.15140	-0.18272	0.36581

ASSEMBLY ROLL CALL ANALYSIS TABLE 16

FILE NCNAME (CREATICN DATE = 06/30/78)

	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
VAR1162	0.14415	0.18117	-0.05667	0.71681
VAR1163	0.29039	0.38945	-0.13680	0.47219
VAR1164	0.23278	0.38482	-0.05756	0.56717
VAR1166	0.03961	0.08813	0.11589	0.60337
VAR1167	0.24603	0.21552	-0.43272	0.06165
VAR1168	-0.15531	-0.17669	0.51175	-0.08856
VAR1169	-0.21176	-0.17130	0.49051	-0.09782
VAR1170	0.47606	0.02365	-0.35558	0.10148
VAR1171	0.20124	0.07131	-0.29224	0.27310
VAR1172	0.89470	-0.11185	0.00931	0.03078

FACTOR CORRELATIONS

	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
FACTOR 1	1.00000	0.17169	-0.52425	0.36962
FACTOR 2	0.17169	1.00000	-0.13906	0.39805
FACTOR 3	-0.52425	-0.13906	1.00000	-0.23240
FACTOR 4	0.36962	0.39805	-0.23240	1.00000
FACTOR 5	-0.33283	0.03575	0.31687	-0.04304
FACTOR 6	0.25502	0.21790	-0.04059	0.31681

FACTOR STRUCTURE

	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
VAR1110	-0.66346	-0.18579	0.79173	-0.29200
VAR1111	-0.67536	-0.19543	0.79319	-0.29597
VAR1112	0.41773	0.56528	-0.27226	0.92738
VAR1113	0.26897	0.06550	-0.12609	0.87150
VAR1114	0.28486	0.10254	-0.15054	0.88244
VAR1115	-0.46908	-0.54839	0.42092	-0.80973
VAR1116	0.86489	0.07642	-0.38521	0.36064
VAR1117	-0.87439	-0.25694	0.54896	-0.27963

VAR1164	0.03063	-0.00021	-0.01394	0.01767
VAR1166	0.03596	-0.01406	-0.05884	0.01375
VAR1167	-0.01247	0.06062	0.04421	0.00544
VAR1168	0.01098	-0.00501	0.03297	0.03811
VAR1169	0.01090	-0.03069	-0.00434	0.00101
VAR1170	-0.00753	0.01669	0.01261	0.04935
VAR1171	0.01657	-0.01209	0.02603	-0.00914
VAR1172	-0.02192	-0.01770	0.00421	-0.01441
PSQ0527	-0.00416	0.08112	0.03610	-0.02365
PSQ0528	0.00607	-0.09910	-0.04495	0.01924
PSQ0529	-0.00225	-0.00293	0.01657	-0.04075
PSQ0533	-0.01149	0.08811	0.04953	-0.00721
PSQ0534	-0.00922	0.09843	0.05421	0.00637
PSQ0535	0.00803	-0.10844	-0.05840	-0.00821
PSQ0539	-0.00405	0.00144	0.05855	0.30358
PSQ0540	0.00711	-0.01789	0.02293	0.28290
PSQ0541	0.00102	-0.02241	0.00677	0.28008
EFQ0135	-0.00591	0.02158	0.18834	0.05516
EFQ0136	-0.02127	0.02613	0.16087	-0.02617
EFQ0140	0.00261	0.01599	0.14735	0.02630
SHC0522	-0.00286	-0.02471	-0.04790	0.01096
SHC0523	0.02099	0.00944	-0.00666	-0.01131
SHC0524	0.00764	0.00219	0.03692	-0.01060
SHC0525	0.00731	-0.00063	0.00898	0.00220
SHC0526	-0.01206	-0.00786	0.00473	0.01737
SHC0527	0.00722	0.00263	-0.04597	0.02962
SHC0528	0.00034	-0.00347	0.03678	0.01946
SHC0529	0.00991	-0.01967	-0.02710	-0.01450
SHC0530	0.00562	0.02433	0.01838	0.06011
SHC0531	0.01725	-0.02078	-0.10379	0.01750
SHC0532	0.01855	0.01048	-0.01185	0.01717
SHC0533	0.01497	-0.01389	-0.02350	0.03194
SHC0534	0.03165	-0.01433	0.00487	0.06209
SHC0535	0.00745	-0.01811	0.00578	-0.00574
SHC0536	0.01691	-0.02111	0.00118	0.03903
SHC0537	0.00672	0.00751	0.11220	0.14140
SHC0538	0.00142	-0.01418	-0.00060	-0.00062
SHC0539	-0.00240	-0.01618	-0.00081	-0.00136
SHC0540	0.02192	-0.03030	-0.00750	0.00464
SHC0541	0.01098	-0.01864	-0.00575	-0.01146
SHC0542	0.03379	-0.01543	-0.00059	0.03340
SHC0543	0.01201	0.00249	0.02214	0.01387
SHC0544	-0.01441	0.06490	0.18879	0.12294
SHC0545	0.01442	-0.03664	0.02877	-0.01436
SHC0546	-0.01919	-0.00297	0.01827	-0.04182
SHC0547	-0.02168	0.00531	0.02079	-0.06448
SHC0548	-0.01178	0.01342	0.03444	-0.03908
SHC0549	0.02089	0.04779	0.04090	-0.00823
CTT0577	0.05717	-0.00370	0.00760	0.04815
CTT0578	0.05278	-0.01765	-0.02780	-0.00978
CTT0579	0.05690	-0.01760	-0.05631	-0.05956
CTT0580	-0.01465	0.00128	0.01091	-0.01188
CTT0581	0.04598	-0.01228	0.01783	0.04274
CTT0582	0.04463	-0.02123	-0.01811	-0.01077
CTT0583	0.01565	-0.01671	-0.03193	-0.02356

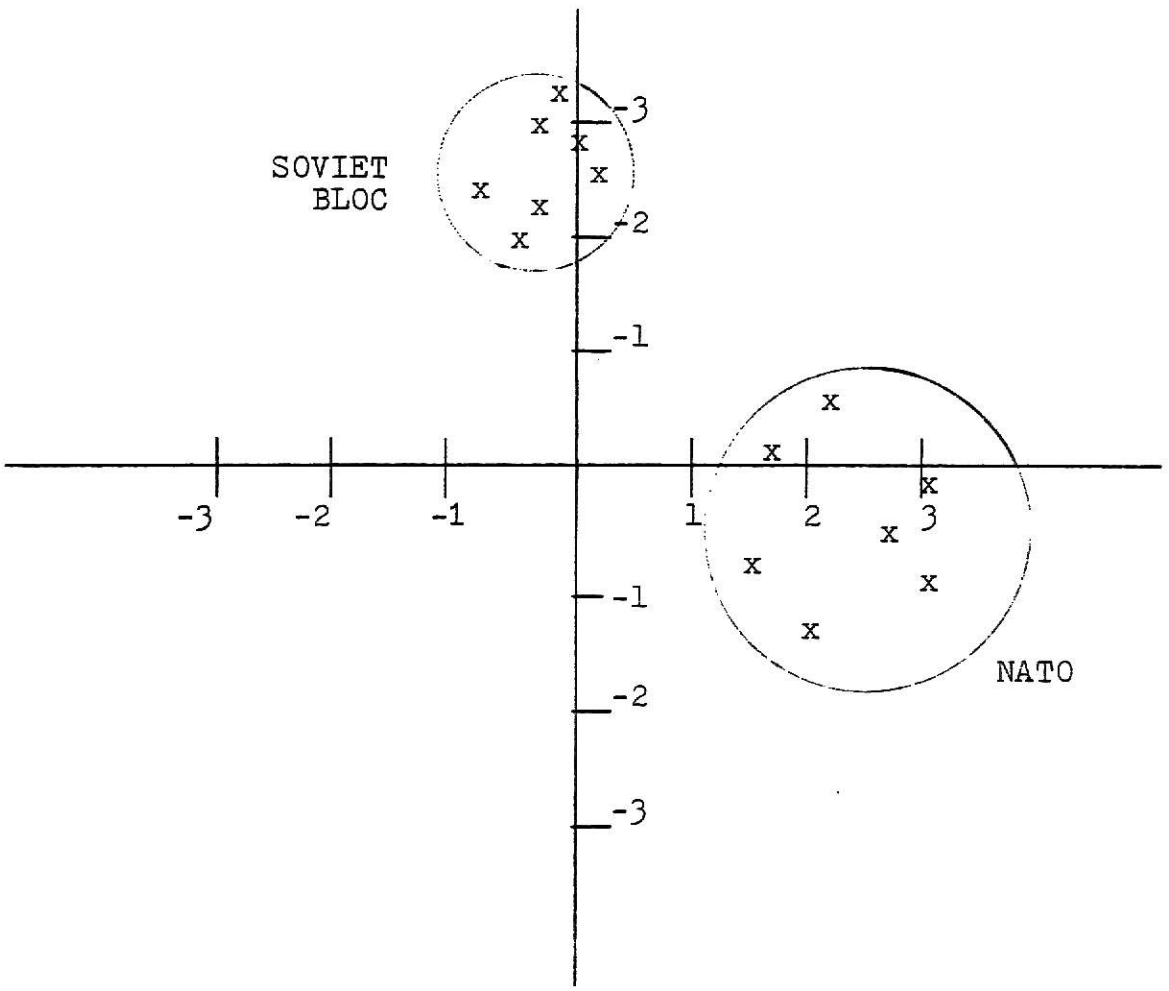
nature of the votes arranged by factor pattern. It can be seen that the factors remain essentially the same as before. Palestine and the Middle East is now factor one. The Cold War is factor three, and Intervention in Africa is factor four. The numbers have no bearing upon the order or ranking of the issue dimensions. The factor correlations matrix is presented along with the pattern matrix, Table 15. It merely gives the correlation of the factor patterns.

The results of the oblique rotation confirm Russett's claim that no important changes occur in the configuration of issue dimensions within the United Nations if that rotation is performed.

Even though the roll call votes load most heavily in an oblique rotation thus making interpretation of the patterns less difficult, there is a drawback which deserves mention. It becomes nearly impossible to graphically present the findings concerning national positions. If the factor patterns are kept orthogonal, their vectors are always at right angles. This makes it possible graphically to illustrate the position of nations on any two factor dimensions. The individual nations are plotted using their factor scores on the two issue dimensions. Figure 2 is a presentation of NATO and WTO with the Cold War dimension on the y axis and Intervention in Africa making up the x axis. This allows for a visual inspection of the cohesiveness of those groups and the direction being taken by maverick nations.

FIGURE 2

COLD WAR BY INTERVENTION IN AFRICA
FACTOR SCORE PLOT



Committee Votes

Some prior studies included roll call votes from sessions of the main committees (Alker and Russett, 1965) and some incorporated votes from the plenary session only (Newcombe, Ross, and Newcombe, 1970). Russett warned against studies which included only plenary votes:

> When making a methodological comparison of two indices it is necessary to examine the same data in each case. Professor Mueller cites only plenary votes, whereas my analysis employed both plenary and committee roll calls. One should be expecially careful with a collection composed exclusively of plenary roll calls.[5]

Yet the results from just such a study found the following:

> Our factor analysis differs from that of Alker and Russett in the following respect: They included roll call votes from sessions of main committees, we cover the plenary sessions only. . . In general, our factor analysis confirmed that of Alker and Russett.[6]

Perhaps a comparison of the original study with a factor analysis of plenary and committee votes would shed some light o n the above paradox.

The selection of committee roll call votes followed the same criteria as per the selection of the original fifty one plenary votes. Careful inspection of all the votes yielded the following: Nine votes from the First committee on Political and Security Questions; Three votes from the Second Committee on Economic and Financial Questions; Twenty-seven votes from the Third Committee on Social, Humani-

tarian, and Cultural Issues; and seven votes from the Fourth Committee on Trusteeship and Non-Self-Governing Territories. Added to the original plenary votes, the total to be factor analyzed now totaled ninety-seven, nearly the limit for the procedure's capacity. All ninety-seven votes are located in the Appendix.

The initial factor matrix, rotated factor matrix, and factor-score coefficient matrix have been reproduced in Tables 17, 18, and 19, respectively. The correlation matrix which contains almost ten thousand coefficients has been omitted.

Eleven factors have been extracted in this analysis. An examination of the original plenary votes finds that they load upon factors one, two, and five, in very much the same manner as they had on the previous factors one, two, and three. The factor loadings, however, have increased dramatically. Two important plenary votes, Var1119, which reads:

> To adopt the draft resol. (A/L.599) Affirming again that the validity of the General Assembly's 1961 decision that any proposal to change the representation of China in the UN is an "important question:"(and therfore requiring a 2/3 majority.)

and Var1120, which reads:

> To adopt the draft resol. (A/L.605) deciding to recognize the People's Republic of China representatives as the only lawful representatives of China to the UN, and to expel forthwith Chiang-Kai-shek's representatives from the UN.

have now loaded heavily upon a single factor, whereas before they had moderately loaded on several factors. That factor

INITIAL FACTOR MATRIX TABLE 17

	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
VAR1110	-0.73333	0.49045	0.09238	-0.05550
VAR1111	-0.74522	0.48957	0.07487	-0.04602
VAR1112	0.75664	0.55723	-0.12021	0.05982
VAR1113	0.55647	0.47008	-0.09961	0.57353
VAR1114	0.58121	0.47689	-0.11053	0.53248
VAR1115	-0.81432	-0.39299	0.07816	0.09739
VAR1116	0.69040	-0.15441	0.49819	0.09602
VAR1117	-0.75095	0.31942	-0.39463	0.09758
VAR1118	0.83042	-0.00725	0.17371	-0.14636
VAR1119	-0.62656	0.39870	-0.23079	-0.12585
VAR1120	0.48027	-0.56688	0.23301	0.23591
VAR1121	-0.76134	0.23516	-0.01930	0.10575
VAR1122	0.83145	-0.19750	0.33117	-0.00838
VAR1123	0.78020	0.52079	-0.08813	0.00162
VAR1124	0.53182	0.66270	0.08957	-0.20150
VAR1129	-0.79052	0.43452	-0.00733	-0.02379
VAR1131	0.80068	-0.21207	0.39709	-0.06508
VAR1132	0.79644	-0.24287	0.34646	-0.02948
VAR1133	0.78135	-0.23620	0.36500	0.08543
VAR1134	0.22429	-0.36238	0.44436	0.36459
VAR1137	0.75545	0.57661	-0.15675	0.09337
VAR1138	-0.68578	0.56806	0.32685	0.04078
VAR1139	-0.66699	0.53432	0.40816	0.01070
VAR1140	-0.70176	0.47611	0.37356	0.04925
VAR1141	-0.68311	0.52236	0.32739	0.03551
VAR1142	-0.64148	0.52538	0.38327	-0.02493
VAR1143	-0.57967	0.46742	0.36916	0.09926
VAR1144	0.75853	0.17733	0.17059	-0.00471
VAR1145	-0.75547	0.48626	0.03648	0.14359
VAR1146	0.71359	0.59542	-0.03494	0.11425
VAR1148	0.27513	0.67212	0.18557	-0.52965
VAR1149	-0.33290	0.50911	0.41492	0.04739
VAR1150	-0.44029	0.53904	0.34022	-0.19177
VAR1151	0.78835	0.53909	-0.14617	0.00785
VAR1152	0.73185	0.49189	-0.13188	0.07728
VAR1153	-0.80375	-0.07490	-0.01134	0.18566
VAR1154	0.76164	0.50853	-0.04567	0.10709
VAR1155	0.79145	0.50277	-0.10282	0.04844
VAR1157	0.77707	0.29355	0.03399	-0.18251
VAR1160	0.61307	0.49970	-0.22980	0.17343
VAR1161	0.71719	0.18619	0.03212	-0.05998
VAR1162	0.77453	0.51974	-0.05709	0.02376
VAR1163	0.75394	0.41077	-0.08251	-0.19690
VAR1164	0.70725	0.48070	-0.10307	-0.13748
VAR1166	0.42423	0.31391	-0.04695	0.20404
VAR1167	0.80640	-0.29309	0.02325	-0.11623
VAR1168	-0.77526	0.27827	0.06377	0.10317
VAR1169	-0.81645	0.28643	0.02453	0.09460
VAR1170	0.79194	-0.24328	0.11714	-0.01677
VAR1171	0.80495	0.16093	0.10357	-0.13158
VAR1172	0.71302	-0.21434	0.44913	0.14584

UN GEN ASSEMBLY ROLL CALL ANALYSIS TABLE 18

FILE NCNAME (CREATION DATE = 06/30/78)

VARIMAX ROTATED FACTOR MATRIX

	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
VAR1110	-0.16934	-0.85538	0.22164	-0.14525
VAR1111	-0.17436	-0.87072	0.20818	-0.14872
VAR1112	0.93145	0.16558	-0.01633	0.00119
VAR1113	0.76211	0.07979	0.03951	0.02372
VAR1114	0.78112	0.09227	0.02176	-0.02000
VAR1115	-0.85805	-0.32932	0.00606	0.08254
VAR1116	0.31905	0.46717	0.02410	0.17981
VAR1117	-0.21967	-0.69047	0.00954	-0.12574
VAR1118	0.54111	0.55483	0.01486	0.15040
VAR1119	-0.12578	-0.81459	-0.02704	0.06218
VAR1120	-0.09114	0.79809	0.01539	-0.04518
VAR1121	-0.33271	-0.66532	0.18152	0.03683
VAR1122	0.37297	0.60692	-0.05481	0.03420
VAR1123	0.91771	0.19587	-0.04454	-0.12065
VAR1124	0.76816	0.10663	0.40429	-0.11743
VAR1129	-0.22372	-0.93470	0.09182	-0.07144
VAR1131	0.32549	0.60667	0.01547	0.13748
VAR1132	0.29860	0.67183	0.01741	0.02057
VAR1133	0.31221	0.56909	-0.06336	0.07164
VAR1134	-0.12705	0.21393	-0.03210	0.16084
VAR1137	0.94093	0.15265	0.00480	0.01262
VAR1138	-0.11652	-0.78404	0.41269	-0.10181
VAR1139	-0.14185	-0.69366	0.48708	-0.13646
VAR1140	-0.19934	-0.72570	0.40192	-0.11799
VAR1141	-0.14251	-0.72707	0.39325	-0.09068
VAR1142	-0.13851	-0.65917	0.48776	-0.21250
VAR1143	-0.10849	-0.62926	0.35058	-0.07733
VAR1144	0.65440	0.36031	0.05909	0.22035
VAR1145	-0.15137	-0.86102	0.17577	-0.09691
VAR1146	0.91946	0.08318	0.01639	0.04573
VAR1148	0.54399	-0.10341	0.49700	-0.28599
VAR1149	0.04166	-0.36864	0.75623	-0.13647
VAR1150	-0.02331	-0.51812	0.64315	-0.14593
VAR1151	0.93715	0.18438	-0.03471	-0.07622
VAR1152	0.89386	0.16013	-0.00118	0.10658
VAR1153	-0.56804	-0.47337	0.10928	0.05128
VAR1154	0.88951	0.12732	-0.02434	0.01526
VAR1155	0.91427	0.20592	0.03753	0.05239
VAR1157	0.69854	0.30892	-0.08440	-0.07967
VAR1160	0.83408	0.10727	-0.05563	-0.15841
VAR1161	0.56640	0.41487	0.17995	0.02498
VAR1162	0.90512	0.20909	0.02356	-0.03448
VAR1163	0.78252	0.22839	-0.08625	-0.07800

Table 18 con't

VAR1164	0.80413	0.17791	-0.02672	-0.01659
VAR1166	0.52565	0.09236	-0.04585	0.03688
VAR1167	0.30496	0.80882	-0.02257	0.03475
VAR1168	-0.31467	-0.68256	0.16879	-0.00387
VAR1169	-0.33348	-0.75531	0.09337	-0.05837
VAR1170	0.34534	0.65101	-0.07196	0.20352
VAR1171	0.65391	0.41709	0.08808	0.03422
VAR1172	0.19975	0.58679	-0.00051	0.11868
PSQ0527	0.27403	0.87125	0.00091	0.00814
PSQ0528	-0.24063	-0.92474	0.07762	-0.00044
PSQ0529	0.25379	-0.11057	0.19972	-0.36872
PSQ0533	0.25238	0.92041	-0.05966	0.03633
PSQ0534	0.25495	0.90665	-0.07752	0.05744
PSQ0535	-0.22505	-0.92892	0.09094	-0.06411
PSQ0539	-0.03449	0.21658	-0.10053	0.90962
PSQ0540	-0.00932	0.16123	-0.17981	0.87388
PSQ0541	-0.08042	0.12431	-0.22778	0.88607
EFQ0135	0.28897	-0.35816	0.82222	-0.09679
EFQ0136	-0.24738	-0.13271	0.70427	-0.07938
EFQ0140	0.44925	-0.26281	0.75045	-0.19039
SHC0522	-0.61118	-0.33182	-0.25686	0.18266
SHC0523	-0.33890	-0.55572	-0.16936	-0.04591
SHC0524	-0.37171	-0.61936	0.04226	-0.09269
SHC0525	-0.39513	-0.66801	0.03853	-0.06318
SHC0526	-0.18802	0.38115	0.11726	0.16045
SHC0527	-0.52946	-0.49290	-0.26302	0.07229
SHC0528	-0.37101	-0.65172	0.15206	-0.06163
SHC0529	0.63122	0.51104	-0.05639	-0.01386
SHC0530	0.34342	0.63143	-0.05740	0.23163
SHC0531	-0.48188	-0.26114	-0.52956	0.21894
SHC0532	0.69436	0.46377	0.03284	0.04960
SHC0533	0.62998	0.42323	-0.00591	0.12475
SHC0534	0.79513	0.30068	0.06795	0.18707
SHC0535	-0.37980	-0.69191	-0.00914	-0.07689
SHC0536	0.72996	0.37401	0.04991	0.14805
SHC0537	0.28615	0.21392	0.16895	0.41310
SHC0538	0.41561	0.58321	-0.02540	0.16267
SHC0539	0.36912	0.55108	-0.01099	0.17305
SHC0540	0.79426	0.36948	0.04121	0.11332
SHC0541	-0.10718	-0.67204	0.32191	-0.07728
SHC0542	0.71289	0.39232	0.05633	0.18507
SHC0543	0.57909	0.50686	0.09311	0.15531
SHC0544	-0.11709	-0.36168	0.68904	0.07800
SHC0545	-0.14331	-0.78590	0.32633	-0.09929
SHC0546	0.37131	0.59519	-0.03645	-0.00452
SHC0547	0.25329	0.69105	-0.03954	-0.02032
SHC0548	0.43615	0.64546	0.03555	-0.01730
SHC0549	0.59536	0.58780	0.03744	0.03596
CTT0577	0.85742	0.20263	0.02856	0.16065
CTT0578	0.94732	0.15974	-0.01790	-0.03646
CTT0579	0.79841	0.16839	-0.04784	-0.17624
CTT0580	-0.67923	-0.45679	0.02362	-0.02803
CTT0581	0.93738	0.22580	0.06280	0.12305
CTT0582	0.93688	0.23112	-0.00146	-0.02345
CTT0583	0.69384	0.36908	-0.06879	-0.03817

UN GEN ASSEMBLY RCLL CALL ANALYSIS TABLE 19

FILE NONAME (CREATION DATE = 06/30/78)

FACTOR SCORE COEFFICIENTS

	FACTOR 1	FACTOR 2	FACTOR 3	FACTOR 4
VAR1110	0.00955	-0.08161	-0.01870	-0.03151
VAR1111	0.01021	-0.08641	-0.02465	-0.03539
VAR1112	0.05180	-0.00341	-0.02215	0.02722
VAR1113	0.05919	-0.01359	0.00891	-0.00442
VAR1114	0.05903	-0.01563	-0.00025	-0.02037
VAR1115	-0.04699	-0.00508	0.02138	0.03788
VAR1116	-0.00412	-0.02490	-0.01217	-0.00559
VAR1117	0.01709	-0.02035	-0.00104	-0.00130
VAR1118	0.00994	-0.00189	-0.00958	0.01545
VAR1119	0.00325	-0.09539	-0.04309	0.05500
VAR1120	-0.01517	0.08452	0.04658	-0.06317
VAR1121	0.00334	-0.01551	0.04922	0.05961
VAR1122	-0.01128	-0.01101	-0.01769	-0.02872
VAR1123	0.05004	-0.01214	-0.04240	-0.04240
VAR1124	0.02420	0.03347	0.07301	0.04086
VAR1129	0.00690	-0.11444	-0.06141	-0.01345
VAR1131	-0.02167	-0.00612	0.00302	0.01821
VAR1132	-0.02279	0.01223	0.01037	-0.01638
VAR1133	-0.01625	-0.02306	-0.02037	-0.02301
VAR1134	-0.01583	-0.07215	-0.03367	-0.05062
VAR1137	0.05167	-0.01775	-0.02304	0.01699
VAR1138	0.00884	-0.04164	0.01690	0.00193
VAR1139	0.00444	-0.01003	0.03865	-0.00174
VAR1140	0.00232	-0.03204	0.01255	-0.00825
VAR1141	0.00861	-0.01966	0.02355	0.02456
VAR1142	0.00104	-0.01971	0.02902	-0.02912
VAR1143	0.01056	-0.00259	0.01035	-0.00758
VAR1144	0.03214	-0.00497	0.00801	0.03021
VAR1145	0.02012	-0.06997	-0.03126	-0.02733
VAR1146	0.04913	-0.02129	-0.01892	0.02188
VAR1148	-0.00459	0.00390	0.08161	-0.01742
VAR1149	-0.00120	0.03492	0.18993	-0.00748
VAR1150	-0.00846	-0.00972	0.12158	-0.00122
VAR1151	0.04737	-0.01752	-0.02889	-0.01930
VAR1152	0.05814	-0.01912	-0.01540	0.02301
VAR1153	-0.00564	0.00553	0.02844	0.03637
VAR1154	0.04453	-0.03600	-0.01905	-0.01725
VAR1155	0.04552	-0.00932	0.00802	0.01739
VAR1157	0.01948	-0.01557	-0.03988	-0.03879
VAR1160	0.06045	-0.02223	-0.04654	-0.05489
VAR1161	0.00269	0.03581	0.09871	-0.00026
VAR1162	0.04731	-0.00544	-0.01485	-0.00874
VAR1163	0.02713	-0.01386	-0.04056	-0.01270

is factor two, which adds much credibility to its role as a Cold War factor. The issue of Chinese Representation had long been a cold war issue and had come before the United Nations every year since 1951. From 1951 to 1960, the United States used a moratorium device asking that the question be deferred. In 1961, the United States used a new tactic to ward off the seating of the PRC and the ejection of the Nationalists. This involved tabling a resolution declaring the matter to be an "important" question in accordance with Article 18 of the Charter. An important question required a two-thirds majority rather than a simple majority to be adopted. Table 20 gives the past history of the voting record on Chinese Representation. Note that in the year under study, 1970, that the "important" question passed by a narrow vote of 66 to 52. The proposal itself actually received a majority for the very first time. This was a foreshadowing of things to come, for in the very next year, the "important question" was not to be passed and the Mainland government was seated resulting in the ouster of the Republic of China.

Turning to the committee votes, note that the three roll calls from the Second Committee are the only ones that significantly load upon factor three which accounts for the presence of that factor. Similarly, three votes from the First Committee dealing with the Law of the Sea Conference make up the greatest portion of Factor four.

TABLE 20

VOTING PATTERNS ON CHINESE REPRESENTATION FROM 1961-1971

SESSION	RESOLUTION DECLARING "IMPORTANT QUESTION"			PROPOSAL TO SEAT PEKING		
	For	Against	Abstain	For	Against	Abstain
16	61	34	7	38	48	20
17	-	-	-	42	56	12
18	-	-	-	41	57	12
19	no voting					
20	56	49	11	47	47	20
21	66	48	7	46	57	17
22	69	48	4	45	58	17
23	73	47	5	44	58	23
24	71	48	4	48	56	21
25	66	52	7	51	49	25
26	55	59	15	76	35	17

* This table from John G. Stoessinger, The United Nations and the Superpowers: China, Russia, and U.S. P. 45.

Those roll calls dealt with a wide range of questions including such concerns as seabed minerals, landlocked countries, territorial waters, and the demilitarization of the ocean floor. These proposals for the conference itself were well received. NATO countries would expect that such a conference would be in their common interests, although at one time the aspect of an Atlantic coalition on the law of the sea was denounced as a politicization of a supposedly functional conference.

All seven roll calls from the Fourth Committee dealt primarily with Africa and loaded upon factor one. The rotated factor matrix gives the loadings. Those committee votes that did load heavily upon a factor are presented in Table 21. It is interesting to note that roll call vote, Shc0538 which reads:

> To retain the phrase, "especially of the peoples of Southern Africa and Palestine:" in operative paragraph 5 of draft resol. (A/C.3/L.1802 Rev.1) re the importance of universal realization of the right of self-determination.

seems to have elements of Africa, Middle East, and Cold War thrown together. This vote loads upon Factors one, two, and five with values of .41, .58, and .59, respectively.

Without doubt, the addition of committee roll call votes adds much to the study of United Nations voting. However their inclusion is not essential to a General Assembly analysis and prior studies that relied exclusively upon plen-

TABLE 21

MAJOR COMMITTEE ROLL CALL LOADINGS

FACTOR 2	
.87	Representation of N. Korea
.92	S. Korea Representation in U.N.
.92	Withdraw Foreign Troops from Korea
.90	Dissolve UNCURK
.92	U.N. Objective in Korea
FACTOR 3	
.82	Disarmament
.70	World Population Year
.75	UNCTAD III
FACTOR 4	
.90	Conference Law of the Sea
.87	" " " " "
.75	Conference Law of the Sea
FACTOR 1	
.85	Withold Asst to Portugal
.94	Sanctions Against Rhodesia
.93	S. Africa
.94	Condemn Exploitation of Colonial Terr.
.79	Special Mission to Spanish Sahara

Weighted Vote Values

The original study operationalized the nations votes by assigning values of 1 through 3 to roll call responses of yes, abstain, and no. Abstain was given a middle postion of 2 which means that a nation so voting would be considered neutral for that vote. The distance between abstain and no is equal to that between abstain and yes, which gives each vote postion, yes and no, the same impact.

The Alker and Russett study (1965) used a method which weights the nation's votes as well as ranking them. The procedure is somewhat complicated and can best be explained using their own example:[7]

> No sacrosanct technique exists for transforming "yes", "abstain," or "no" into ranks. . . It was finally decided to use the ranks held by each state on a roll call. For example, on a roll call with ten "no" votes, 30 "abstain" votes, and 60 "yes" votes, the rank assigned to the ten countries in the negative would be their average rank, 5.5. Similarly, abstentions would merit 25.5; and affirmative votes would receive a rank of 70.5. Subtracting these ranks from the average rank of all nations that are voting (50.5), and standardizing the results so that the new voting scores have a mean of zero and an average squared value of one, the "standardized ranks" that result (indicated by Z's) would be Z(Yes)=0.80, Z(Abstain) =-1.00, and Z(No)=-1.80.

What happens exxentially from the above manipulation is that abstain is no longer considered as being a neutral position. Abstain is always somewhere between yes and no, but tends to shift towards the minority vote. The reason for this being,

as Alker and Russett put it, "Those abstaining against the pressure of a sizable majority come out closer to the scores of those who said no than they do to those in the affirmative."[8] Referring back to the example, note that the mean in a standardized rank is zero. Alker and Russett refer to this value as a "truly middle position". This cannot be interpreted as a neutral position on the roll call vote but rather as an average position relative to all the other nation's positions.

The major premise upon which the above ranking procedure rests, is that abstaining nations favor the minority viewpoint. This also has the net effect of treating the majority position as partially self-causal due to the influence and pressure which may coerce some nations to vote with the majority. There is considerable debate as to whether nations act as sheep and whether abstain should be taken as a vote sympathetic with the minority. When considering a roll call vote as a representation of an issue or a fragment of an issue, a nation may be for, against, or neutal on that subject. The standardized ranking makes no allowance for a neutral position unless the vote is evenly split. The greates problem arises in the instance when a nation actually is neutral. Referring back to the example, note that the interval between Z(Yes)=.80 and Z(Abstain)= -1.0 is 1.8, while the distance between Z(No)=-1.8 and Z(Abstain) is .8. A truly neutral nation is relegated to a

position much closer to the No position. The neutral position should actually be equal to -.5, and the difference between this position and abstain is -1.0 minus -.5 = -.5 units. This error, presuming that a nation really meant to be neutral is relatively large. Another problem occurs in that the impact of a nation's vote decreases as more nations vote in a like manner. In the example, an affirmative vote has a magnitude of .80 while a negative vote has a magnitude of 1.8. This causes the votes of sixty nations to equal that of forty nations, which is a contradiction of the one-nation one-vote principle.

It is curious that Russett, in his own study nearly two years later, departed the standardized ranking and instead coded each state as 2(affirmative), 1(abstain) and 0(negative). He made no mention as to why he opted for that method.

In summary, the original study's operationalization of voting position concerntrates upon a nation's stand relative to the issue itself, rather than relative to the position of the other nations, and is in keeping with most voting analysis that study issue alignments.

Regression Equation Approach

The use of the regression analysis in the original study assumes that the independent variables, the environmental effects, are uncorrelated causal indicators with ad-

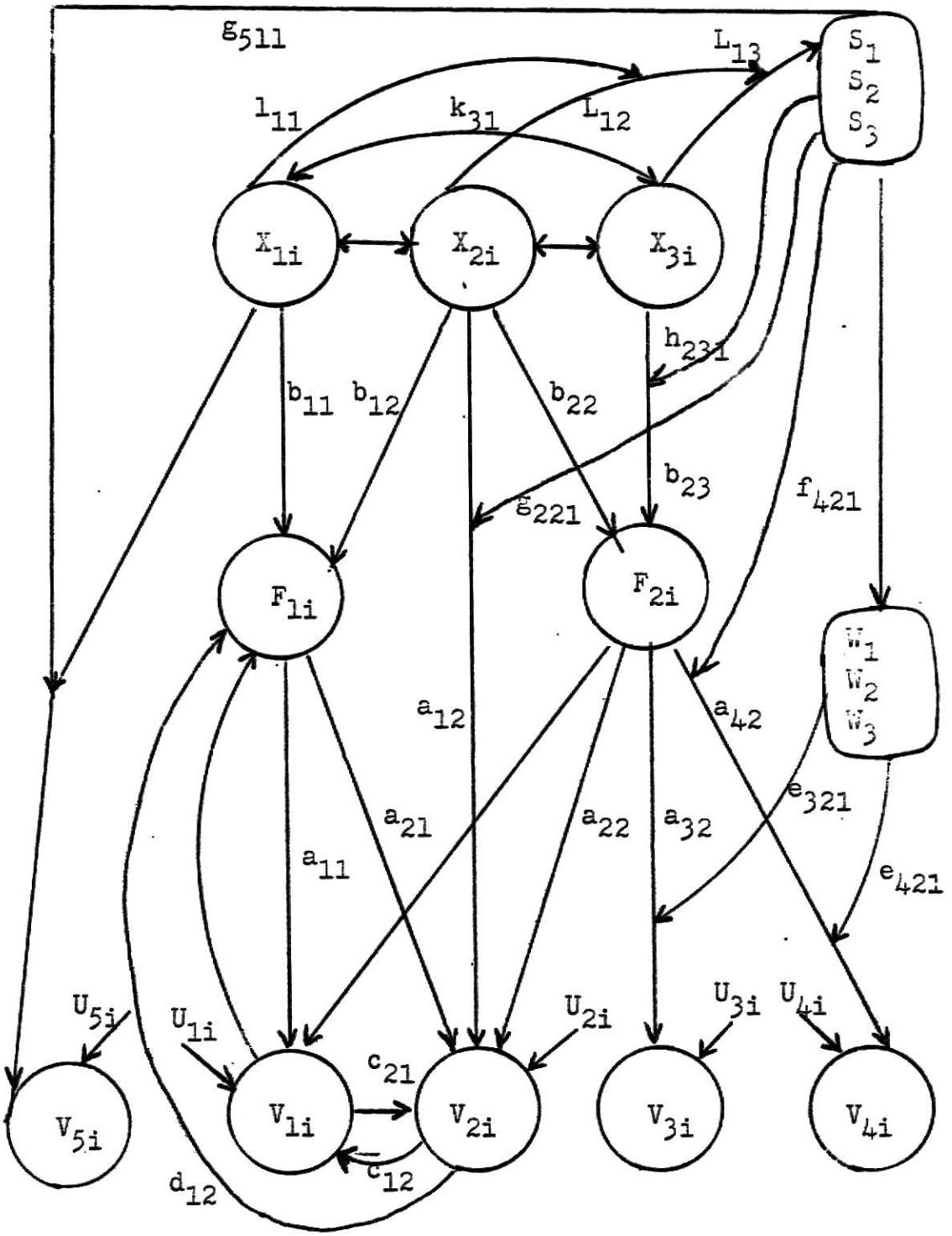
ditive effects upon voting behavior. Hayward Alker, Jr. has recently suggested that there may exist a number of non-universal, nonadditive effects. In Figure 3 is Alker's model of U.N. voting for a hypothetical nation, labeled "i". The original regression analysis considered the nation's votes (V) to be exlanable in terms of several factors (F). The factors (F) were themselves causally dependent on the environmental determinants (X) of aid, alliances, and diplomatic representation.

Alker, in his model, brings into play the problems concerning resolution wordings (W) and subjectively interpreted situational characteristics(S). These cause symbolic maneuvering (e) and situational effects (f,g,h). Vote trading (c) and feedback (d,l) also occur which cause a lag due to vote commitments. Alker states that the unknown influences (U) cannot account only for independent additive factors. Even though the residuals in a multiple regression do take into account, they may not be linear in actuality.

The approach taken in the study only considered the (a) and (b) paths. If the (k) paths were strong relationships between the environmental variables then the problem of multicollinerity would also arise.

Because of the causal connections between the various indicators and the voting behavior of nations, the multiple regression equation cannot draw valid conclusions about the actual determinants of voting behavior. In fact the great

Fig. 3 MODEL OF UNITED NATION VOTES FOR NATION i



This diagram was adapted from H.R. Alker, Jr., 1974. "Computer Simulations: Inelegant Mathematics and Worse Social Science?" International Journal of Mathematical Education in Science and Technology 5: 139-155.

number of parameters involved in Alker's model seem to preclude any mathematical approach to the problem of directly predicting voting behavior.

NOTES

1. Raymond B. Cattell, "The Meaning and Strategic Use of Factor Analysis," *Handbook of Multivariate Experimental Psychology* (Chicago: Rand, McNally, and Co., 1966) pp 174-243.

2. John E. Mueller, "Some Comments on Russett's 'Discovering Voting Groups in the U.N.'", *American Political Science Review* Vol. 60, No. 2, (June, 1966), pp. 327-337.

3. Bruce M. Russett, "Discovering . . ." *Op. Cit.*, p. 148.

4. Jack E. Vincent, "Predicting Voting Patterns in The General Assembly," *American Political Science Review* Vol. 65, No. 2 (June, 1971) p. 478.

5. Bruce M. Russett, "Discovering. . ." *Op. Cit.*, p. 147.

6. Hanna Newcombe, Michael Ross, and Alan G. Newcombe, "United Nations Voting Patterns," *International Organizations* Vol. 24, No. 1 (Winter, 1970) pp. 100-21.

7. Alker and Russett, *World Politics in . . . Op. Cit.*, p. 30.

8. *Ibid.*, p. 31.

9. Hayward R. Alker, Jr., "Polimetrics: Its Descriptive Foundations," Handbook of Political Science Volume 7, 1975, p. 155.

CHAPTER V

CONCLUSIONS

President Nixon, in his address to the United Nations on October 23, 1970 declared:

> "We must transcend the old patterns of power politics in which nations sought to exploit every volatile situation for their own advantage or to squeeze the maximum advantage for themselves out of every negotiation."

This study of that year of United Nations activity has indeed found a shift in the old patterns of U.N. issues. The Cold war has taken a back seat to the African issue. However, an examination of the individual voting records of the Soviet Union and the United States finds that the animosity between those superpowers still existed. Hardly was a spirit of co-operation kindled in 1970. Furthermore, the military alliances of NATO and WTO were easily recognizable as voting alignments quite apart from one another. The issues of the cold war had also remained steadfast. China and Korea were still the dominant instruments of the Cold War as in times past. Possibly the decline in importance of the Cold War was due, at least in part, to an overall changing distribution of power within the General Assembly. The rapidly expanding members of the third World were outside either the Western or Eastern camps and were interested in their own

problems, the most important being racial dignity.

The findings of this study also showed that bloc voting within the General Assembly exists and is primarily East-West. Although some may deplore the bloc structure of the United Nations, wanting in its place a situation in which all nations indulge in equally close relations, the reality of bloc voting exists. One author recognizes this reality but warns against too much solidarity:

> The continuing health of the U.N. depends not on the elimination of blocs, but on a spreading pattern of blocs in constant formation, dissolution, and reformation. The call for a united Western Front, however, is a counsel of despair, based usually upon the dubious conviction that the 2nd and 3rd worlds, working as a team, have isolated the Christians.[1]

Voting groups and caucasing groups are part of the political process within the United Nations. In fact, they facilitate the workings of that process. It remains today that no single group of nations controls the United Nations.

The Last Word on Factor Analysis

This report has attempted to present factor analysis so that its use could be understood by the reader and justified by the current researcher. Hopefully, from the step by step presentation, the study could be easily replicated. The emphasis which this report has placed upon justification of the research method is an attempt to avoid drawing the charge of subscribing to a defective methodological technique.

Some years ago, factor analysts were the object of severe criticism. One such criticism, "Tom Swift and his theory-inventing factor analysis machine," condemned the statistical method.[2] Although some of the criticism was well deserved, much of the difficulty was caused by failure to communicate the basic theory behind the method and not in the method itself. For instance, Hayward Alker, Jr., who pioneered the use of factor analysis in the social sciences is uninterpretable in the following passage:

> Moreover, if the investigator's problem is one of inferring causally valid measurements, he should be able to justify the assumption, inherent in the use of factor analysis for causal inference purposes, that the phenomena he has observed and measured are not themselves causally related, but linearly, causally dependent on underlying, uncorrelated causal factors. . . . Unless model platonisms clearly correspond to substantive heuristics within empirically progressive research programs, their validity must be suspect.[3]

This study has found factor analysis to be of considerable value in the study of roll call votes in the United Nations. Table 12 had compared the voting records of the U.S. and Soviet Union by visual inspection. Factor analysis allows for the comparison of all 127 nations in the United Nations — simultaneously.

In summary, the greatest cost of using a statistical approach to political phenomenon can be attributed to a failure to adequately communicate findings to others. One argument exists which finds the time spent o statistical

method utterly wasted:

> Training graduate students intensively in multivariate quantitative methods such as factor analysis makes less time available for developing a sophisticated awareness of what has classically been thought and said about political life.[4]

This study contradicts that argument by illustrating that a balance of statistical knowledge and political thinking aids in the study of modern political phenomena such as United Nations roll call voting patterns.

NOTES

1. John W. Holmes, "A Non-American Perspective," The Changing United Nations: Options for the United States (New York: Capital City Press, 1977) P. 42.

2. J. Scott Armstrong, "Derivation of Theory by Means of Factor Analysis or Tom Swift and His Electric Factor Analysis Machine," American Statistician Vol. 21 No. 5, pp. 17-21.

3. Alker, "Polimetrics . . " Op. Cit., p. 154.

4. Ibid., p. 157.

APPENDIX I

FACTOR ANALYSIS: MATH MODEL

Factor analysis encompasses more than just one concept. There are various methods of factor analysis: Principal factoring without iteration; principal factoring with iteration; Rao's canonical factoring; alpha factoring; and image factoring. Each method would require a separate mathematical model. The method chosen for this study was the principal component solution, which assumes that the vote variables operate linearly thus:

$$Y_1 = \alpha_{11}F_1 + \alpha_{12}F_2 + \ldots\ldots \alpha_{1m}F_m ,$$

$$Y_2 = \alpha_{21}F_1 + \alpha_{22}F_2 + \ldots\ldots \alpha_{2m}F_m ,$$

$$Y_3 = \alpha_{31}F_1 + \alpha_{32}F_2 + \ldots\ldots \alpha_{3m}F_m ,$$

$$\vdots \qquad \vdots \qquad \vdots$$

$$Y_n = \alpha_{n1}F_1 + \alpha_{n2}F_2 + \ldots\ldots \alpha_{nm}F_m$$

Where: Y = UN roll call
α = A constant
F = A function, F ( ), of some unknown variables

It is crucial to remember that F is a function of variables and not a variable. The outcome of factor analysis is that it defines the unknown F functions. The alpha constants are the loadings which emerge.

APPENDIX II

ROLL CALL VOTES

Var 1110 18 Sept 70
To adopt the Proposal for the inclusion of sub-item (c) the report of the UNCURK - in the agenda (A/8100).

Var 1111 18 Sept 70
To retain the title, "Question of Korea" (A/8100).

Var 1112 12 Oct. 70
To adopt the draft resol. (A/8086) setting the program of action for the full implementation of the declaration on the granting of independence to colonial countries and peoples.

Var 1113 13 Oct 70
To adopt operative parag. 1 of draft resol. (A/8106) re apartheid, said paragraph calling upon all states to take immediate steps to implement fully the provisions of Security Council resol. 282 (1970) concerning the strengthening of Arms Embargo against South Africa.

Var 1114 13 Oct 70
To Adopt the draft resol. (A/8106) calling upon all states to take immediate steps to implement fully the provisions of Security Council Resol. 282 (1970) regarding the strengtening of the Arms Embargo against S. Africa and requesting the Secretary-General to report thereon to the G. A. by 12-10.

Var 1115 22 Oct 70
To adopt the Portuguese proposal for a separate roll call vote on the new paragraph 6 f the "Declaration On the Occasion of the 25th Anniversary of the UN"

Varl116 4 Nov 70
To adopt the draft resol. (A/L. 602/REV. 2 & Add. 1) affirming the acquisition of territories by force is inadmissible; that respect for the rights of Palestinians is indispensable in establishing peace (in the MIddle East); calling upon parties to resume contact with the Secreatary-General's special representative to enable him to implement Security Council Resol. 242 (1967)

Var 1117 4 Nov 70
To adopt the draft resol. (A/L. 604) requesting the parties concerned to resume discussion with the Secretary-General's special representative in the MIddle East; recommending scrupulous observance and extension of cease-fire, with the addition of measures for its observance including if possible use of UN observers now in the region.

Var 1118 13 Nov 70
To adopt the Amendment (A/L. 608/REV.1) adding the words, "Except with regard to the credentials of the representatives of the Government of South Africa", at the end of Draft Resol. (A/8142, Para. 19) re the credentials of representatives to the 25th General Assembly session.

Var 1119 20 Nov 70
To adopt the Draft Resol. (A/L. 599 & ADD. 1) affirming again that the validity of the General Assembly's 1961 decision that any proposal to change the representation of China in the UN is an "Important Question" (and therefore requiring a 2/3 majority vote).

Var 1120 20 Nov 70
To adopt the Draft Resol. (A/L. 605) deciding to recognize the People's Republic of China representatives as the only lawful representatives of China of the UN, and to expel forthwith Chiang-Kai-Shek's representatives from the UN.

Var 1121 30 Nov 70
To adopt Draft Resol. (A/8163) condemning all forms of racial discrimination and reaffirming intention to take the opportunity of "International Year For Action To Combat Racism" to promote throughout the world social justice based on absolute respect for the dignity of the individual.

Var 1122 30 Nov 70
To retain the words, "And Palestine", in operative parag. 5 of Draft Resol. (A/8163) re the importance of the universal realization of self-determination.

Var 1123 3 Dec 70
To adopt the Draft Resol. (A/8188) condemning the UN's failure to end the illegal regime in Southern Rhodesia and the intervention of South African Armed Forces in Southern Rhodesia and the intervention of South African Armed Forces in Southern Rhodesia; calling upon the UN to submit a report to the Special Committee On Colonialism as requested in Assembly Resolutions, and calling for the Security Council to widen its sanctions against the Southern Rhodesian regime.

Var 1124 7 Dec 70
To adopt operative parag. 3 of Draft Resol. (A/8195) re a UN Conference On Human Environment; said paragraph recommends that the Preparatory Committee for the 1972 Conference consider financing possible action to ensure that additional resources are provided to developing countries in the context of protection of the environment.

Var 1129 7 Dec 70
To adopt the Draft Resol. (A/8185) reaffirming UN objectives in Korea, requesting the UNcurk to continue its work and noting that the greater part of UN forces have already withdrawn from Korea.

Var 1131 8 Dec 70
To adopt the Cral proposal for a priority vote on the Somali proposal that Draft Resol. C recommended for adoption X by the Special Political Committee (A/8204/ADD.1) comes within the category of "Other Questions" and requires only s simple majority for adoption.

Var 1132 8 Dec 70
To adopt the Somali proposal that Draft Resol. C recommended for adoption by the Special Political Committee (A/8204/ADD. 1) comes within the category of "Other Questions" and requires only a simply majority for adoption.

Var 1133 8.Dec 70
To adopt Draft Resol. C (A/8204/ADD. 1) recommended by the Special Political Committee; Draft Resol. C recognizes that the people of Palestine are entitles to equal right and self-determination in accordance with the UN Charter and that full respect for their inalienable right is an indispensable element in the establishment of a just and lasting peace in the Middle East.

Var 1134 8 Dec 70
To adopt Draft Resol. D (A/8204/ADD. 1) considering that the plight of dispaced persons continues in the Middle East; calling once more upon the government of Israel to immediately take effective steps for the return of these displaced persons.

Var 1137 8 Dec 70
To adopt the Draft Resol. (A/8106/ADD.1) condemning the establishment of "Bantustans" by the government of South Africa; urging all states to terminate their diplomatic, military, economic and other cooperation and to suspend their cultural, educational and sporting exchanges with South Africa; requesting the Special Committee on apartheid to report to the 26th General Assembly session, especially with regard to the implementation of parag. 5 of Assembly Resol. 2506B (XXIV).

Var 1138 9 Dec 70
To adopt preambular paragraphs 7 and 8 of Draft Resol. (A/8178) on Respect for Human Rights in Armed Conflicts.

Var 1139 9 Dec 70
To adopt the last part of operative parag. 3 of the Draft Resol. (A/8178) on Respect for H man Rights in Armed Conflicts' the last part reads: "...in so far as they are applicable, in particular, to war cprrespondents who accompany armed forces but are not actually a part of them."

Var 1140 9 Dec 70
To adopt the following words in operative parag. 4 of the Draft Resol. (A/8178) on respect for human rights in armed conflicts: "...And providing, inter alia, for the creation of a universally recognized and guaranteed identification document."

Var 1141 9 Dec 70
To adopt the following words in operative parag. 5 of the Draft Resol. (A/8178) on respect for human rights inarmed conflicts: "...In order that a draft international agreement might be adopted as soon as possible by the General Assembly or by some other appropriate international body."

Var 1142 9 Dec 70
To adopt operative parag. 6 of Draft Resol. (A/8178) on respect for human right in armed conflicts; said paragraph requests the Secretary-General, in consultation with the international committee of the Red Cross and other appropriate international organizations, to submit a report on the question of human right in armed conflicts to the 26th session of the General Assembly.

Var 1143 9 Dec 70
To adopt Draft Resol. (A/8178) expressing grave concern over the fate of press correspondents in areasof armed conflict; inviting parties to conflict to respect the Geneva Conventions of 12 Aug. 1949 and inviting the ECOSOC to request the human rights committee to consider preparing a draft international agreement ensuring the protection of journalists.

Var 1144 9 Dec 70
To adopt the Draft Resol. (A/8178) condemning actions of countries conducting aggressive wars in violation of the UN Charter and the 1925 Geneva Protocol and 1949 Geneva Convention; recognizing the need for additional instruments for the protection of civilian populatons and freedom fighters.

Var 1145 9 Dec 70
To adopt the Draft Resol. (A/8178) calling upon all parties to armed conflicts to comply with 1949 Geneva Convention regarding the treatment of prisoners-of-war; urging that combatants not covered by Article 4 of the 1949 Geneva Convention be accorded the same humane treatment applied to prisons-of-war.

Var 1146 9 Dec 70
To adopt the Draft Resol. (A/8186) condemning the government of South Africa for, and drawing the Security Council's attention to the need for taking measures to deal with, that government's persistent refusal to withdraw its administration from Namibia; requesting the UN council for Namibia to perform its function.

Var 1148 11 Dec 70
To adopt the Amendment replacing preambular parag. 7 of the Committee 2 Draft Resol. on permanent sovereignty over natural resources by a new text (A/L.620 & ADD.L).

Var 1149 11 Dec 70
To adopt Draft Resol. (A/8213) authorizing the Secretary-General to carry out in 1971 activities specified in his report (A/8103 & CORR.1) and to provide travel grants to certain partcipants from the less-developed countries; thanking Ghana for the offer to provide facilities for the 1971 regional sumposium.

Var 1150 11 Dec 70
To adopt Draft Resol. (A/8219) requesting the Secretary-General to invite member-states to communicate their views and suggestions concerning a review of the UN Charter by 1 July 1972 and for the Secretary-General to report thereon to the 27th General Assembly, on whise agende it was decided to incluse this item.

Var 1151 14 Dec 70
To adopt the Draft Resol. (A/8243) condemning the exploitation of colonial territores, particularly the constrction of the Cabora Bassa project; requesting administering powers to put an end to all such practices.

Var 1152 14 Dec 70
To adopt Draft Resol. (A/8187) condemning Portugal's colonial policy; appealing to all states, expecially those in NATO, to withhold their assistance to Portugal which enables her to pursue a colonial war in the territories; recommending the Security Council tocontinue giving special attention to problems in Portuguese territories.

Var 1153 14 Dec 70
To adopt the motion for a separate vote on operative parag. 4 of Draft Resol. (A/8241) re the transmission of information on non-self-governing territories under Charter Article 73E; said paragraph considering that the UK should continue to transmit such information on the territories of Antigua, Dominica, Grenada, St. Kitts-Nevis-Anguilla, St. Lucia and St. Vincent.

Var 1154 14 Dec 70

To adopt Draft Resol. (A/8241) deploring the failure of some member states to transmit properly the necessary information required under Charter Article 73E; condemning the government of Portugal in this regard and again urging administering powers concerned to transmit such information.

Var 1155 14 Dec 70
To adopt the Draft Resol. (A/8244) appealing for full coperation to achieve UN objectives re the declaration on the granting of independence to colonial countries and peoples; urging discontinuance of all collaboration with the governments of South Africa, Southern Rhodesia and Portugal until they renounce their policies of discrimination.

Var 1157 14 Dec 70
To adopt Draft Resol. (A/8242) reaffirming the inalienable rights of the people of Oman to self-determinaton; urging the UK to implement fully Assembly Resol. 1514 (XV) and other relevant resolutions; recommending specialized agencies and other international organizations to study the possibilities of extending educational, technical and health assistance to Oman.

Var 1160 14 Dec 70
To adopt Draft Resol. (A/8248) again inviting the administering power concerned to determine procedures for holding a referendum in the territory of Spanish Sahara; inviting all states to refrain from making investments in the territory; requesting the Secretary-General to send a special mission to the territory to assist in the implementation of relevant General Assembly resolution, expecially in regard to UN participation in the referendum.

Var 1161 14 Dec 70
To adopt the amendment (A/L.622) inserting the words, "And peoples under alien domination: after the words "Colonial peoples," in operative parag.5 of Draft Resol. (A.L.621 & ADD. 1 & 2) re the declaration on the granting of independence to colonial countries andpeoples.

Var 1162 14 Dec 70
To adopt Draft Resol. (A/L.621 & ADD. 1 & 2)reaffirming the legitmacy of colonail peoples to exercise the right of self-determination; urging all states, specialized agencies and other organization to assist the national liberation movements and to withhold assistance from the governments of Portugal, South Africa and Southern Rhodesia.

Var 1163 14 Dec 70
To retainthe words , "Antigua, Dominica, Grenada, St. Kitts-Nevis-Anguilla, St. Lucia, St. Vincent," in the title and preambular parag.1 of Draft Resol. (A/8248) concerning the twenty-five territores.

Var 1164 14 Dec 70
To adopt Draft Resol. (A/8248) reiterating the declaration against the disruption of national unity and the establishment of military bases in the 25 territories; strongly urging that the adminstering powers concerned allow UN missions to visit the territories and that the UN render all help to peoples of the territories in their efforts freely to decide their future status.

Var 1166 15 Dec 70
To retain the word "Neo-Nazi" in preambular parag. 5 of Draft Resol. (A/8252 & CORR.1) re measures to be taken against Nazism and racial intolerance.

Var 1167 15 Dec 70
To adopt the amendment deleting operative parag. 4 of the Draft Resol. (A/8252 & CORR.1) on meausres to be taken against Nazism and racial intolerance; aforesaid paragraph requests the Secratary-General to publish a brochure on measures take and envisaged for combating resurgence of any form of Nazism and racial intolerance.

Var 1168 15 Dec 70
To adopt the amendment deleting operative parag. 5 of the Draft Resol. (A/8252 & CORR.1) on measures to be taken against Nazism and racial intolerance; aforesaid paragraph requests the Secretary-General to explore the possibility of holding in 1972 or 1973 an international seminar on questions re combating Nazism and racial intolerance.

Var 1169 15 Dec 70
To adopt the amendment to Draft Resol. (A/8252 & CORR.1) on measures to be taken against Nazism and racial intolerance; said amendment replaces operative paragraph 6 with the words, :Decided to retainthis item on the agenda."

Var 1170 15 Dec 70
To adopt Draft Resol. (A/8173/ADD.1) condemning gevernments of South Afica, Southern Rhodesia and Portugal for their inhuman treatment of political prisoners and detainees; condemning gevernments still maintaining diplomatic, economic, cultural andother relations with the governments of South Africa and Southern Rhodesia and calling upon them to break off such relations.

Var 1171 15 Dec 70
To adopt the Draft Resol. (A/8237) calling upon the gevernment of Israel to immediately implement the recommendations of the special committee to investigate Israeli practices re human right in occupied territories; to comply with the 1949 Geneva Convention and the universal declaration of human rights; requesting the aforesaid special committee to continue its work and report thereon to the Secretary-General.

Var 1172 15 Dec 70
To adopt operative parag. 6 of Draft Resol. (A/8259) re the UNCTAD III, which paragraph requests the Trade and Development Board to consider, in the light of the international development stratey for the second UN developemtn decade, Assembly Resol. 1995 (XIX) and TDB Decision 45 (VII), reforms in the institutional arrangements of UNCTAD and its methods or work designed to increase its effectiveness, and submit such suggestion to UNCTAD III.

Shc 0521 9 Dec 69
To adopt Draft Resol. (A/C.3/L.1751), as amended, deciding to give highest priority to consideration of the item of "Creation of the Post of UN High Commissioner for Human Rights" with a view to the possibility of concluding such consideration at the 25th regular assembly session.

Shc 0522 13 Oct 70
To adopt the US Amendment (A/C.3/L.1784 & CORR.1) to Draft Resol. (A.C.3/L.1767/REV.2) on youth and its education re human right and participation in national development; said amendment replacing preambular parag. 8 with a new one.

Shc 0523 13 Oct 70
To adopt the Amendment (A/C.3/L.1790/REV.1) to Draft Resol. (A/C.3/L.1767/Rev.2) on youth and its education re human rights and partcipation in national development; said amendment replaces preambular parag.6 with a new text.

Shc 0524 13 Oct 70
To adopt the Anendment (A/C.3/L.1790/REV.1) to Draft Resol (A/C.3/L.1767/REV.2) on youth and its education re human right and participation in national development; said amendment replacing preambular parag. 8 with a new one.

Shc 0525 13 Oct 70
To adopt the Amendment (A/C.3/L.1790/REV.1) to Draft Resol. (A/C.3/L.1767/REV.2) on yough and its education in human rights and participation in national development; said amendment replacing preambular parag. 9 with a new one.

Shc 0526 13 Oct 70
To adopt Syrian Amendment (A/C.3/L.1772), as orally revised, adding words to preambular parag. 10 of Draft Resol. (A/C.3/L.1767/REV.2) on yough and its education on human rights and national development.

Shc 0527 14 Oct 70
To adopt point (II) of Amendment (A/C.3/L.1778) to Draft Resol. (A/C.3/L.1767/REV.2) on youth and its education on human right and national development; said point replacing part of operative parag.4 with the words, "Decides to bear in mind the possibility of convening another world youth assembly in the future."

Shc 0528 14 Oct 70
To adopt the Amendment (A/C.3/L.1790/REV.1) to Draft Resol. (A/C.3/L.1767/REV.2) on youth and its education re human rights and partcipation in national development; said amendment adding the words,"And the vigilant preservation of freedom of speech," after the words, "Truly universal representation," in operative parag.4 of the Draft Resol.

Shc 0529 14 Oct 70
To adopt the Amendment (A/C.3/L.1795), as orally revised, to Draft Resol. (A/C.3/L.1767/REV.2) on youth and its education rehuman right and national development; which amendment adds a new operative paragraph considering it important that, I.A., young people should resolutely oppose all action designed to suppress liberation movements.

Shc 0530 14 Oct 70
To adopt the Iraqi Sub-Amendment (A/C.3/L.1795) to the Sub-Amendment (A/C.3/L.1794) to Draft Resol. (A/C.3/L.1767/REV.2) on youth and its education re human rights and national development; said Sub-Amendment changing the wording of operative parag. 8.

Shc 0531 14 Oct 70
To adopt the US Amendment (A/C.3/L.1784 & CORR.1) to Draft Resol. (A.C.3/L.1767/REV.4) on youth and its education re human rights and national development; said Amendment replacing former operative parag.8 with a new one.

Shc 0532 4 Nov 70
To adopt operative parag. 6 of Draft Resol. (A/C.3/L.1800/-REV.1) on elimination of all forms or racial discrimination; said paragraph calling upon governments to terminate diplomatic, consular, commercial, military, social and other relations with the government of South Africa and other racist regimes in Southern Africa in accordance with the General Assembly and Security Council Resolution.

Shc 0533 4 Nov 70
To adopt operative parag. 7 of Draft Resol. (A/C.3/L.1800/REV.1) on the elimination of all forms of racial discrimination; said paragraph condemning the UK government for its reluctance to bring down the regime in Southern Rhodesia and calling upon the UK to restore lawful right to the people of Southern Rhodesia in accordance with the principles of international law and the UN Charter.

Shc 0534 4 Nov 70
To adopt the Draft Resol. (A/C.3/L.1800/REV.1) condemning all forms of racial discrimination; noting expecially that such exists in Southern Africa; requesting the Secretary-General, the specialized agencies and other organization to continue programs designed to combat racial discrimination and to publicize the evils of these policies.

Shc 0535 4 Nov 70
To adopt the Draft Resol. (A/C.3/L.1799/REV.1) condemning all forms of racial discrimination and reaffirming intention to take the opportunitu of "International Year for Action to Combat Racism" to promote throughout the world, social justice based on absolute respect for the dignity of the individual.

Shc 0536 4 Nov 70
To adopt operative parag. 1 of the Draft Resol. (A/C.3/L. 1802/REV.1) re the importance of the universal realization of self-determination; said paragraph affirming the legitimacy of the struggle of peoples under colonial and alien domination to restore to thenselves the right of self-determination by any means at their disposal.

Shc 0637 4Nov 70
To adopt operative parag. 3 of Draft Resol. (A/C.3/L.1802-/REV.1) re the importance of universal realization of self-determination; said paragraph calling upon governments that deny the rifht of self-determination of peoples to recognize and observe that right in accordance with international instruments and the principles of the UN Charter.

Shc 0538 4 Nov 70
To retain the phrase, "Expecially of the peoples of Southen Africa and Palestine: in operative parag. 5 of Draft Resol. (A/C.3/L.1802/REV.1) re the importance of universal realization of the right of self-determination.

Shc 0539 4 Nov 70
To adopt operative parag. 5 of the Draft Resol. (A/C.3/L.1802/REV.1) re the importance of the universal realization of self-determination; said paragraph condemning governments that deny the right of self-determination of peoples recognized as being entitled to it, especially the peoples of Southern Africa and Palestine.

Shc 0540 4 Nov 70
To adopt the Draft Resol. (A/C.3/L.1804/REV.1) recognizing the right of peoples under colonial domination in legitimate exercise of their right ot self-determination to seek and receive all kinds of assistance in accordance with UN resolutions and the spirit of the UN Charter.

Shc)541 1 Dec 70
To adopt the Draft Resol. (A/C.4/L.1797/REV.3) expressing grave concern over the fate of press correspondents in areas of armed conflict; inviting the parties to conflict to respect the Geneva Conventions of 12 Aug. 1949 and inviting the ECOSOC to request the Human Rights Committee to consider preparing a draft international agreement ensuring protection of journalists.

Shc 0542 1 Dec 70
To adopt operative parag. 4 of Draft Resol. (A/C.3/L.1798/ REV.5) re human rights in armed conflicts, said paragraph affirming that participants in resistance movements in Southern Africa and colonial territories, struggling for their liberation and self-determination, should be treated, if arrested, as prisoners-of-war in accordance with the Hague Convention of 1907 and the Geneva Convention of 1949.

Shc 0543 1 Dec 70
To adopt Draft Resol. (A/C.3/L.1798/REV.5) condemning the actions of countries conducting aggressive wars in violation of the UN Charter and the 1925 Geneva Protocol and 1949 Geneva Convention; recognizing the need for additional international instruments for the protection of civilian populations and freedom fighters.

Shc 0544 1 Dec 70
To adopt operative parag. 5 of Draft Resol. (A/C.3/L.1806-/REV.2 & CORR.) re respect fur human right in armed conflicts, which paragraph affirms that dwellings and other installation that are used only by civilian populations should not be the object of military operations.

Shc 0545 1 Dec 70
To adopt Draft Resol. (A/C.3/L.1808/REV.2 & CORR.) calling upon all parties to armed conflicts to comply with the 1949 Geneva Convention regarding treatment of prisoners-of-war, and urging that combatants not covered by Article 4 of the 1949 Geneva Convetion be accorded the same humane treatment defined by principles of international law applied to the prisoners-of-war.

Shc 0546 3 Dec 70
To adopt the first Saudi Arabian Amendment (A/C.3/L.1820) to the French Procedural Motion (A/C3/L.1819) re the organization of the committee's work; said amendment reduces from 7 to 5 the number of meetings to be devoted to the consideration of the item on the creation of the Poast of UN High Commissioner for Human Rights.

Shc 0547 3 Dec 70
To adopt the second Saudi Arabian Amendment (A/C.3/L.1820) to the French Procedural Motion (A/C.3/L.1819) re the organization of the third committee's work; said amendment, as orally revised by its sponsor, concerns the allocation of the number of meetings by Committee 3 to the agenda items not yet discussed.

Shc 0548 7 Dec 70
To adopt the oral motion to adjourn debate on the item re creation of the Post of UN High Commissioner for Human Right until the 26th General Assembly session.

Shc 0549 8 Dec 70
To adopt Draft Resol. (A/8038, ANNEX II) calling upon all states to arrest and extradite persons who committed war crimes and crimes versus humanity, and to intensify their cooperation in the exchange of information contribution to the apprehension andpunishment of such persons.

Efq 0135 23 Nov 70
To adopt the Draft Resol. (A/C.2/L.1124/REV.1) requesting the Secretary-General to formulate proposals for establishing links between disarmament decade and the second UN development decade, so that resources released by disarmament would increase assistance to less developed countries; requesting the Secretary-General to help mobilize world public opinion in support of this link.

Efq 0136 25 Nov 70
To adopt the Draft Resol. (A/C.2/L.1126) designating 1974 as World Population Year (WPY); requesting the Secretary-General to prepare a detailed program of measures and activities for the WPY and inviting interested organizations of the UN system to assist in preparing such a program.

Efq 0140 11 Dec 70
To adopt parag. 6 of Draft Resol. (A/C.2/L.1130/REV.2) re the UNCTAD; said paragraph requests the Trade and Development Board (TDB) to consider, in the light of international development strategy for the second UN development decade, Assembly Resol. 1995 (XIX) and TDB decision 45 (VII), reforms in the institutional arrangements of the UNCTAD and its methods of work designed to increase its effectiveness, and submit such suggestions to UNCTAD III.

Psq 0527 30 Oct 70
To adopt Draft Resol. (A/C. 1/L. 520) inviting "Simultaneously and without condition: the representatives of both North Korea and the Republic of Korea to participate, without right of vote, in the committee discussion of the Korean question.

Psq 0528 30 Oct 70
To adopt the Draft Resol. (A/C.1/L.521) inviting the representative of the Republic of Korea to participate in UN discussion of the Korean question, without right of vote, and reaffirming UN willingness to invite the representative of North Korea if the latter accepts the competence of the UN over the question

Psq 0529 17 Nov 70
To adopt the Peruvian Amendments (A/C.1/L.528) to Articles I, II, III, and IV of the draft treaty on prohibition of emplacement of nuclear weapons and other weapons of mass destruction on the sea-bed and....in the subsoil thereof, annexed to Resol. (A/C.1/L.523).

Psq 0533 24 Nov 70
To adopt the Draft Resol. (A/C.1/L.524) deciding that all American and other foreign military personnal in South Korea under the title of "United National Forces" should be withdrawn in their entirety within 6 months following the adoption of this resolution.

Psq 0534 24 Nov 70
To adopt the Draft Resol. (A/C.1/L.524) deciding to dissolve UNCURK following the adoption of this resolution.

Psq 0535 24 Nov 70
To adopt Draft Resol. (A/C.1/L.531) reaffirming UN objectives in Korea, requesting the UNCURK to continue its work and noting that the greater part of the UN Forces have already withdrawn from Korea.

Psq 0539 3 Dec 70
To adopt the Amendment (A/C.1/L.564) adding the words, "In a framework of close international cooperation," at the end of preambular parag. 5 of Draft Resol. (A/C.1/L.562) re a conference on the Law of the Sea.

Psq 0540 16 Dec 70
To adopt the Amendment (A/C.1.L.564) deleting the last sentence in operative parag. 3 of Draft Resol. (A/C/1/L.562) re a conference on the Law of the Sea.

Psq 0541 16 Dec 70
To adopt the Amendment (A/C.1/L.564) adding and replacing certain words in operative parag. 6 of Draft Resol. (A/C.1/L.562) re a conference on the Law of the Sea.

Ctt 0577 18 Nov 70
To adopt Draft Resol. (A/C.4/L.966/REV.1) condemning Portugal's colonial policy; appealing to all states, expecially those in NATO, to withhold their assistance to Portugal which enables her to pursue a colonial war in her territories; recommending the Security Council to continue giving special attention to the problems in Portuguese territories.

Ctt 0578 18 Nov 70
To adopt Draft Resol. (A/C.4/L.970)condemning the UN's failure to end the illegal regime in Southern Rhodesia and the intervention of the South African Armed Forces in Southern Rhodesia; calling upon the UK to submit a report to the special committee on colonialism as requested in assembly resolutions and calling for the Security Council to widen its sanctions against the Southern Rhodesian regime.

Ctt 0579 10 Dec 70
To adopt Draft Resol. (A/C14/L.983) again inviting the administering power to determine procedures for holding a referendum in the territory of Spanish Sahara; inviting all states to refrain from making investments in the territory; requesting the Secretary-General to send a special mission to Spanish Sahara to assist in the implementation of relevant General Assembly resolutions, especially in regard to UK participation in the referendum.

Ctt 0580 11 Dec 70
To adopt the motion for a serarate vote on operative parag. 4 of Draft Resol. (A/C.4/L.982 re the transmission of information from non-self-governing territories under Charter Articles 73E; said paragraph considering that the UK should continue to transmit such information on the territories for Antigua, Dominica, Grenada, ST. Kitts-Nevis-Anguilla, St. Lucia and St. Vincent.

Ctt 0581 11 Dec 70
To adopt Draft Resol. (A/C.4/L.975) appealing for full cooperation to achieve UN objectives with regard to implementation of the declaration on the granting of independence to colonial countries and peoples; urging discontinuance of all collaboration with the governments of South Africa, Portugal and Southern Rhodesia until they renounce their discriminatory policies.

Ctt 0582 11 Dec 70
To adopt Draft Resol. (A/C.4/L.986) condemning the exploitation of colonial territories, particularly the construction of the Cabora Bassa project.; requesting the administering powers to put an end to all such practices.

Ctt 0583 11 Dec 70
To adopt Draft Resol. (A/C.4/L.982) reaffirming the inalienable rights of the people of Oman to self-determination; urging the UK to implement fully Assembly Resolution 1514 (XV) and other relevant resolytions; recommending the specialized agencies and other international organizations to study the possibilities of extending educational, technical and health assistance to the territory.

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DISCERNING VOTING PATTERNS IN THE UNITED NATIONS: A FACTOR ANALYSIS OF THE 25TH SESSION OF THE GENERAL ASSEMBLY

by

HAROLD DEAN CARR

B. S., Kansas State University, 1977

AN ABSTRACT OF A MASTER'S REPORT

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This report explored the voting patterns in roll call votes of the 25th General Assembly for the purpose of determining voting groups of nations and major issue dimensions in that body. Uncovering major voting groups within the United Nations aids in the study of the cohesion of groups in the international community. Ranking the major issues that come before the General Assembly facilitates the research of the distribution of power within the United Nations and possibly in the international system itself.

This study drew from a wide range of earlier work on roll call votes. The greater part of the theory employed in this study had been previously introduced in the book, World Politics in the General Assembly, by Hayward R. Alker, Jr., and Bruce M. Russett, (New Haven: Yale University Press, 1965). Some of their findings concerning earlier sessions of the General Assembly were compared to the results of this study.

This report initially studied fifty-one votes in the plenary. Those votes were factor analyzed and the results were orthogonally rotated according to Kaiser's varimax criteria. The resulting principal factors that emerged, ranked in order of importance, were: Intervention in Africa; Cold War; and Middle East. Two major modifications were then made in a follow up study. First, experimentation was attempted using various oblique rotations. This resulted in the major factors being intercorrelated which sharpened the issue dimensions somewhat, but the grouping of nations remained relatively

undisturbed. The second modification involved the inclusion of roll call votes from the various committees of the General Assembly bringing the total votes up to ninety-seven. This greatly enhanced the delination of the Cold War factor, as well as helping to identify the less prominent issue factors.

The findings of this study tended to conform with those of other studies. The East-West voting bloc were discerned and closely resembled the military alliance pacts, WTO and NATO. The major issues were similar to those of former sessions of the General Assembly, except that the Cold War was no longer the prominent issue. Environmental effects were considered in a regression equation, but the results were suspect after consideration of an alternative model of U.N. voting.