

Local Voting Studies of Total Electorates: The Danish General Election of 1971

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1. Introduction

The voting study described in this article was carried out in connection with the Danish general election on September 21, 1971, for the Danish State Television network, which wanted the main results utilized for the TV broadcast on the very night of the election.

The study had two main purposes. The first was to describe the major characteristics of the voters of the different parties at the 1971 election. These characteristics include attitudes toward some of the leading issues of the campaign. The second was to describe the voters' party changes since the previous election in 1968.

Some severe restrictions were laid on the design of the study; most important was that the results should be ready for presentation on TV only one hour after the closing of the polling stations. We were in search of a design that allowed for fast data collection – after the voters had cast their votes – and fast data processing.

We chose to make use of local studies. Three different polling districts were selected: 1) a rural district in Jutland, dominated by the Agrarian Liberals, 2) a suburban, white-collar district on Funen with a Conservative and Radical Liberal over-representation compared to the national voting distribution, and 3) a working-class district in Copenhagen, strongly dominated by the Social Democrats and the socialist parties.

The background of the study, as well as the study design, is the topic of section 2, where the methodological pros and cons are also discussed briefly. The results of the study as far as concerns party strength and party change 1968–1971 are described in section 3, where a tendency of switching to a party more to the left than the voters' 1968 preferences is very clear in two of the three districts. In the third district, however, more moves to the right than to the left are found. In section 4 the tendency to changing one's party preference to the left is shown to be much stronger among the opponents of Denmark's entry into the EEC than among the supporters. This is found in all three districts.

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In section 5, dimensionality of the Danish party system is approached in two ways: 1) by comparing the aggregated attitudes to issues and policies of the voters of the various parties, and 2) by analyzing the pattern of party change. When using the first approach, we found support for a hypothesis of unidimensionality in the Danish party system; when using the second approach, the findings were not consistent with a unidimensional model, even though the left-right dimension seems to be the most important dimension. A short summary follows in section 6.

2. The Study

The Background

During the sixties the efforts in empirical political sociology at the University of Aarhus were concentrated on ecological analyses. Some of the best known are the ecological analyses of the Danish postwar elections carried out by Ole Borre and the late Jan Stehouwer,¹ on the basis of the commune-level data archive at the Institute of Political Science. In order to develop these aggregate studies of voting behavior further, it was felt that there was a need for additional knowledge about voting behavior at the individual level.

Jan Stehouwer and some of his colleagues readily accepted an invitation from the Danish State Broadcasting Service to carry out a voting behavior study in connection with the referendum about lowering the voting age from 21 to 18 years in June 1969.² Inspired by a study made in Utrecht in the Netherlands during the day of the parliamentary election in 1967,³ a survey was carried out on polling day in the municipality of Odder, south of Aarhus. The results of the study were shown on the TV broadcast on election night, and a report on the study was published in Danish.⁴

The study design was repeated nine months later, again in Odder,⁵ in connection with the elections to the local councils, in March 1970.

In many ways the situation in 1971 was different from those of 1969 and 1970.⁶ But a strong argument for continuing the tradition was introduced, when it was proposed to leave Odder and find three new polling districts in different parts of the country for parallel studies of the Odder type. This would enable us to observe the voting behavior of most of the electorate in different places, where patterns of behavior would presumably be different.

A study of this kind is of course an individual-level study, but it can also be seen as a contribution to bridging the gap between ecological and individual-level voting studies. Ecological voting studies have to use the net flows of the voters in the aggregates because, although gross flows are more interesting, they are normally unknown. Our aim was to describe and to analyze the gross flows of those who actually voted in three different election districts on the basis of their answers about voting behavior. While the methodological shortcomings of the design discussed below make it difficult to perfectly link answers about individual behavior

with the net flows of the political ecologists, as seen in election statistics, knowledge of gross flows in selected units is one means of establishing some kind of connection between the two research levels.

The Design

The three polling districts were selected on the basis of the following criteria:

1. One should be found in the Capital, one on the Islands and one in Jutland, i.e. the three main regions of the election law.
2. One of the districts should be heavily urbanized, one suburban in character, and one primarily rural.
3. An important criterion was the location of the districts in parts of the country where politically important and interesting movements among the voters could be expected.
4. The size of the selected districts should be such that the data could be processed in due time. Experience from Odder revealed that this would be 3000–5000 eligible voters in each district.
5. Though there had been many alterations of polling districts after the municipality reform of April 1970, we wanted three unchanged districts for the sake of comparison.
6. Districts with only one polling station were preferable, and the layout and facilities of the polling station should also be appropriate for our purposes.

These criteria combined led to the selection of the three districts of Enghave in the southwestern part of Copenhagen, Dalum, a suburb of Odense on Funen, and Hammerum outside Herning in Jutland.

The procedure was the same in all three districts: After each voter had cast his vote, he was asked by experienced interviewers to fill in a questionnaire in a room nearby. The questionnaires were filled in by the respondents themselves, but those who wanted it were helped. Thus the effect of interviewing was minimized.

Male voters received blue questionnaires and females red ones. The questions were about the voter's age and about voting behavior at the actual election and at the previous parliamentary election of 1968. Then came a question about attitude toward Denmark's entry into the EEC, and finally one of five alternating questions. The five types of questionnaires were distributed at random, and thus each of these alternating questions was answered by about 20 percent of the respondents. One was about voting behavior on the referendum on the lowering of the voting age to 20 years, held at the same time as the general election, and the other four concerned some of the issues of the campaign.

Some Methodological Problems

When the three districts are taken together, they deviate only slightly from the national voting distribution. It is a consequence of the selection procedure that one

cannot say that the representativeness of the three districts is satisfactory, and therefore the selection procedure makes it natural to look upon the districts separately. It must, however, be stressed that the question of representativeness is not decisive. With the existing level of information about voting behavior in Denmark, it would be interesting just to have an idea of the directions of the major trends. Studies on a local level have often given valuable starting information in several sectors of the social sciences.

When the question of dimensions in the party system is discussed in section 5, it will only be to put forward some reasonable hypotheses that can be tested later on. The large amount of data material in this study is very usable in this context.

The design also has, given its limitations, some real advantages. The data were collected at the polling stations immediately after the voting. The number of recall errors is therefore minimal. The outcome of the election was not known when the questions were answered. This means that the classical 'band-wagon' and 'under-dog' effects can be ruled out.

This holds only for the 1971 voting. But the design includes one inevitable source of error: Voting behavior in 1968 is viewed in retrospect. The recall errors probably have an effect toward underestimating the real rate of party change.⁷ Besides simple recall errors, some of the respondents may feel that their behavior at the 1968 election was wrong – seen in the light of the later development. Some of these voters may have stated the party they by now feel they ought to have voted for in 1968. Other hypotheses about the errors stemming from *ex post facto* questions can be stated; but they can be neither confirmed nor rejected in this connection.

The study of party changes involves other problems, when we look at local districts. If the retrospective results of the study are to be compared with the official voting distributions in 1968, then we have to consider three types of movements in the electorate: the abstainers and the demographic and geographic transitions.

Those who voted in 1968 but abstained in 1971 are not included in this study. It is quite possible that the voters for some of the parties in 1968 abstained to a higher degree in 1971 than the other parties' supporters. Although the effect of such a selective abstaining is interesting, it can only be estimated vaguely by relating the study's retrospective figures for 1968 with the official records, and even then they are not quite comparable.

The second factor mentioned is the demographic transition. If sympathy for a specific party is connected with a specific generation, then one should, in a given time, expect a politically selective mortality. Some 5 percent of the electorate in 1968 died before the 1971 election, but the age distributions of the major parties do not exhibit very great differences, so therefore the effect of a selective mortality will not be considered serious.

The boundaries of the three districts have not changed,⁸ but some geographical mobility has certainly occurred. Nevertheless, we do not expect geographical mobility to be highly selective in a political context, since the socioeconomic characteristics remained largely unchanged from the previous election.

Table 1. Comparison of Official Voting Results in the Three Districts and the Corresponding Results of the Study, 1968 and 1971, Percentages

	A	B	C	E	F	K	L	Q	U	V	Y	Total	N	Turn-out	Eli-gible voters		
	Social Democrats	Radical Liberals	Conservative People's Party	Justice Party (Single Taxers)	Socialist People's Party	Communists	Liberal Center Party	Christian People's Party	Independent Party	Agrarian Liberals	Left Socialists	Invalid, No Answer, etc.					
1. Hammerum	The Election	26.7	14.3	17.4	1.5	3.2	0.3	•	4.4	•	31.1	0.7	0.4	100.0	2770	91.6	3023
	The Study	26.6	14.3	17.1	1.5	3.3	0.2	•	4.3	•	29.0	-0.8	2.9	100.0	2486	89.7	2770
1968	The Election	22.9	11.2	17.9	1.0	1.7	0.1	0.9	•	1.3	42.2	0.5	0.3	100.0	2655	93.8	2830
	The Study	23.9	15.8	19.4	0.7	1.7	0.1	0.4	•	0.6	29.1	0.6	7.7	100.0	2341*	•	•
1971	The Election	33.6	20.3	25.4	1.2	7.0	0.7	•	1.4	•	8.4	1.4	0.6	100.0	4218	88.8	4749
	The Study	33.5	19.5	25.4	1.2	6.9	0.7	•	1.4	•	7.9	1.6	1.9	100.0	3460	82.0	4218
1968	The Election	32.8	18.4	30.0	0.4	4.8	0.7	0.8	•	0.3	10.6	0.9	0.3	100.0	4216	92.5	4560
	The Study	31.5	19.9	28.1	0.6	3.9	0.3	0.8	•	0.1	7.1	0.5	7.2	100.0	3193*	•	•
1971	The Election	53.2	7.3	6.6	1.0	20.3	4.2	•	0.7	•	1.9	4.3	0.5	100.0	3664	85.4	4290
	The Study	53.0	7.0	6.6	0.9	20.3	3.7	•	0.7	•	1.9	4.3	1.6	100.0	3099	84.6	3664
1968	The Election	49.0	11.8	11.7	0.4	13.4	4.2	2.3	•	0.1	1.7	5.1	0.3	100.0	3910	85.6	4568
	The Study	55.9	8.2	8.0	0.5	14.7	3.5	0.6	•	-	1.4	2.6	4.6	100.0	2823*	•	•

* The differences between the totals for the three districts are due to the omission in this Table of those who said that they were non-voters or were not eligible to vote in 1968.

Marginals from the questions about voting behavior in 1971 and 1968 are given in Table I with the corresponding official results.⁹ Inspection of the Table shows that the marginal distributions of the answers about voting behavior in 1971 are very close to official election results in all three districts. In most cases the figures are either identical or differ by only 0.1 percent. This is of course important for the confidence we can have in our findings. Equally important are the differences between the official results from 1968 and the distributions from this study. Even though most of our 1968 figures differ less than 1.0 percent from the official figures, more important differences are also found. For the Agrarian Liberals in Hammerum and for the Social Democrats in Enghave the deviations are quite considerable (13.1 and 6.9 percent, respectively).

It is impossible to evaluate the relative importance of the different methodological problems discussed above. Probably only half of the non-voters in 1971 also abstained in 1968.¹⁰ Another cause of the discrepancies is those who could not (or would not) remember how they voted in that election. These two factors can easily explain most of the differences. Rationalization and especially the psychological unwillingness of voters to admit change of party are probably also at work,¹¹ even though it is rather difficult to say where it is most important and how much it means. What is left unexplained by these three factors (and even more than that) can easily be explained by the last factor mentioned here: the migration of the electorate, which we believe is the most important.

3. Party Change 1968–1971

Having stressed the methodological shortcomings of the study (at least when considered as a study of total electorates), we are able, in Tables II–IV, to depict how the changes in party strength were brought about. The percentages in these Tables are calculated on the basis of all respondents in the district in question.

If the parties are seen as located on a left-right continuum as shown in the Tables (cf. section 5 below), then the pattern of party change in the districts of Dalum and Enghave (Tables III and IV) is that of a general move to the left. The net effect of this move was, however, reduced by a weaker move in the opposite direction. In Hammerum (Table II) on the other hand, there were more voters changing to a party to the right of their 1968 preference than voters changing to a party to the left. However, this may be due to a stronger propensity among the 1968 Agrarian Liberals than among the supporters of the other parties in this district to state their former party preference incorrectly.

The dominant tendency in Hammerum is the considerable interchange among the three parties who had formed the government since 1968, the Radical Liberals, the Conservatives, and the Agrarian Liberals. More than half of the party changes in Hammerum were between these parties. The dominant position of the govern-

ment parties, and especially the Agrarian Liberals, in this part of the country must, however, be remembered. It must also be noted that the new Christian People's Party – as was generally expected – got most of its support from former Conservatives and Agrarian Liberals. Also, the move from the Radical Liberals to the Social Democrats and from both these parties to the Socialist People's Party is well worth mentioning because the same pattern is found as the dominant tendency in the other districts.

Little is known about the success of the Radical Liberals in 1968 when they had a net gain of 7 percent of the electorate as compared with 1966. It is generally believed that this was largely due to the votes of former Social Democrats. If the decisive factors of 1968 did not manifest themselves to the same degree in 1971, there would probably be a considerable shift from the Radical Liberals to the Social Democrats.

A change on these lines is found in Dalum, as well as in Hammerum and Enghave. What makes the situation different in Dalum is that the Radical Liberals received more than a 100 percent replacement from the Conservatives. This is very interesting, considering the fact that both Mr. Baunsgaard, who was the leader of the Radical Liberals and Prime Minister since 1968, and Mr. Ninn-Hansen, the new leader of the Conservatives, were candidates on Funen, where Dalum is situated. The third important movement in Dalum is from the Social Democrats to the Socialist People's Party. That is the reason why the Social Democrats had only a small net gain.

Especially in Enghave (Table IV) the move to the left was the outstanding tendency: from the Conservatives to the Radical Liberals and the Social Democrats, from the Radical Liberals to the Social Democrats, the Socialist People's Party, and Left Socialists, and – most important – from the Social Democrats to the Socialist People's Party. The net gain of the Socialist People's Party of 6–7 percent in this district is probably due to its position on the Common Market issue, discussed in the next section.

In conclusion, it can be said that the main characteristics of the voters' movements were the same in the three districts: from the Conservatives to the Radical Liberals, from the Radical Liberals to the Social Democrats, and from that party to the Socialist People's Party. The magnitude of these movements differed, however, from one district to another, and so did the districts with respect to the existence of other important flows.

Space limitations do not allow for breakdowns on sex and age,¹² but attention should be drawn to three other phenomena that can be discussed on the basis of Tables II–IV. The first is how the proportion of stable voters differs among the parties and among the districts. The highest proportion is found among the Conservatives in Dalum (81 percent), the lowest among the Left Socialists in the same district (16 percent before rounding). The differences in the proportion of new voters voting for the different parties are just as striking, and so are the different shares which the parties got of the non-voters in 1968.

4. The Common Market Issue

The campaign dealt with only few issues. Instead, the evaluation of the government was the main concern. If, however, one had to point out an important issue, it was the question of Denmark's membership in the EEC. The decision is to be made in a decisive referendum, in October 1972. Nevertheless, there was hardly a political debate during the campaign where this issue was not discussed.

The parties' attitudes toward this issue follow neatly the classical left-right dimension, with the outstanding exception of the small Justice Party (Single Taxers). On the left the socialist parties were declared opponents. On the right the Conservatives and the Agrarian Liberals, especially, were clearly for EEC membership. In between were the Social Democrats and the Radical Liberals. Both had candidates for and against membership, but the majorities of the candidates and the top-level leaders in both parties were declared supporters.

We tried to measure the electorate's attitude toward this issue by asking hypothetically: 'If this were a referendum about Danish entrance into the EEC together with England, would you then vote for or against?' British membership was at that time uncertain. The question was, however, politically significant in Denmark, and this addition was therefore relevant in the political context.

The net distributions on the questions were very different in the three districts. In Hammerum, a clear majority was for Danish membership, in Enghave a similar majority was against, while Dalum took an intermediate position. This was also to be expected because of the different party distributions in the districts.

The pattern of answers follows a left-right dimension in all the districts. The socialist parties' voters were predominantly against the EEC. A majority among the Conservatives and especially among the Agrarian Liberals were for. The same clear tendencies cannot be found among the Social Democrats and the Radical Liberals. The voters of the former party had a somewhat higher proportion of opponents, while those of the latter were mostly for Danish membership.

When the parties' official attitudes are brought to mind, the proportion of opponents among the Social Democrats is surprisingly high.

The party distributions in the districts explain a lot of the differences between the districts on this question. A very interesting feature should, however, be added. Within each party, the proportion of opponents is higher when the districts' net

Table V. Attitude toward Denmark's Entry into the EEC, by Districts and Sex, Percentages

	Hammerum			Dalum			Enghave		
	Males	Females	All	Males	Females	All	Males	Females	All
For	61	41	51	53	39	46	30	20	25
Against	24	22	23	31	31	31	57	56	56
Other*	15	37	26	16	30	23	13	24	19
Total	100	100	100	100	100	100	100	100	100
N	1228	1258	2486	1676	1784	3460	1376	1723	3099

* Includes Would Abstain, Don't Know, and No Answer to this specific question.

proportion is higher. This can probably be explained by a regional influence, as the influence from the social environment to some extent seems to follow the dominant attitudes in the district.

Interesting patterns are revealed when the female voters' attitudes to this ques-

Table VI. Party Change in Major Groups* and Attitudes toward Danish Entry into the EEC in the Three Districts, Percentages

Party Change	Attitude toward EEC									
	Hammerum			Dalum			Enghave			
	For	Against	Other†	For	Against	Other†	For	Against	Other†	
Stable voters±	Socialist parties	0	6	2	1	12	3	4	30	11
	Social Democrats	14	46	30	20	43	42	56	49	69
	Radical Liberals	13	10	14	17	13	14	9	3	4
	Agrarian Liberals and Conservatives	63	20	41	49	11	28	20	2	6
		90	82	87	87	79	87	89	84	90
Left swing	To socialist parties	0	7	1	0	9	2	2	11	3
	To Social Democrats	3	5	4	3	5	4	3	2	3
	To Radical Liberals	3	2	3	5	3	4	2	0	0
		6	14	8	8	17	10	7	13	6
Right** swing		4	4	5	5	4	3	4	3	4
Total		100	100	100	100	100	100	100	100	100
N		1092	438	473	1395	866	576	631	1500	492

* Only those who in 1968 and 1971 voted for one of the following parties or party groups are included: socialist parties (i.e. Communists, Left Socialists, and Socialist People's Party), Social Democrats, Radical Liberals, and Conservatives and Agrarian Liberals.

† See footnote to Table V.

± Including party changes within a party group (i.e. among socialist parties or among Agrarian Liberals and Conservatives).

** From socialist parties to other four, from Social Democrats to the Government parties, and from Radical Liberals to Conservatives or Agrarian Liberals.

tion are compared to male attitudes. The females have about the same proportion of opponents as the males; a somewhat lower proportion are for the EEC; and a much higher proportion are undecided. This holds in all three districts.

In spite of the correlation between party choice and age, the correlation between age and the proportion of opponents is very low. In some parties a higher proportion of older opponents can be found. This may be caused by a greater tendency for party change among younger than among older opponents of EEC membership. The rate of party change is higher among voters against EEC membership than among voters for Danish membership. This holds in all districts. The switches toward right and left outweigh each other among voters who are for EEC membership, while the movement toward the left dominates clearly among those against membership.

Among opponents to EEC membership the party changes are mainly from the Social Democrats to the Socialist People's Party, and, to a lesser degree, to the Socialist People's Party from the Radical Liberals. The same tendencies cannot be found to the same high degree among voters for the EEC. One could, then, be tempted to think of the EEC issue as one cause of the swing toward the left. But a warning should be given here: The attitude to the EEC question is probably highly correlated with attitudes toward other issues – especially those toward foreign politics. This swing may, then, be caused by a more general change in the electorate's foreign political attitudes.

5. The Dimensionality of the Danish Party System

A great deal of the discussion about unidimensional versus multidimensional models of party systems can be traced back to Anthony Downs' unidimensional model for party competition, where it is assumed that both voters and parties are distributed on a unidimensional continuum from left to right. It is further assumed that the individual will vote for the party located nearest to himself on this continuum. This model has been subject to strong criticism by Donald E. Stokes¹³ and Philip E. Converse,¹⁴ among others. The latter doubts the reality of unidimensional models and points out that it is often necessary to assume that there may be considerable differences in the individual voter's perception of the location of the parties on the left-right continuum. Marke and Swedner¹⁵ have found, from Swedish material, that scarcely half of the respondents perceived the party spectrum unidimensionally and that there were more different and consistent location patterns of parties on a continuum. Bo Särilvik¹⁶ has found, by means of data on party voting changes, that the right-left dimension is the most dominant feature in the Swedish party system.

Investigations of dimensions in the Danish political system are very few. Mogens N. Pedersen *et al.*¹⁷ have found, on the basis of data on voting behavior in

the Danish parliament, that 'the Danish party space is at least two-dimensional'.¹⁸ On the contrary, the unidimensional model is supported by research made by Hans Jørgen Nielsen, who finds certain stable patterns in the attitudes toward foreign political issues among the voters of the political parties.¹⁹

Research on party distances and dimensions in the party system may, however, be done on the basis of different approaches. Mogens N. Pedersen *et al.*²⁰ have given an adequate survey of some of these possibilities:

Table VII. Some Possible Approaches to the Study of Party Distances and Dimensions of Party Systems

Unit of analysis	Party ideology, program	Individual voter	Legislator	Parliamentary party
Type of data	Data from content analysis of programs, policy statements, etc.	Interview data: - party preference orderings - party voters' policy attitudes - party voting changes	Interview data: - ranking of parties - policy attitudes Voting data: - roll calls	Voting data: - total population of divisions - subsets of divisions Data on cabinet coalition formation

In the following we will use two of these approaches on our material: 1) party voters' policy attitudes (however, the unit will not be the individual voter but the various parties' electorates) and 2) party voting changes.

Policy Attitudes and Dimensionality

In the above-mentioned article by Hans Jørgen Nielsen, the basis is the individual voter's attitude to foreign political issues during the period 1961-1965. For each issue the prevailing attitude of the different parties' electorates is found. By ranking the net majorities according to size he found in all the questions a general pattern indicating the presence of one main dimension. The unit is the parties' electorates and not the individual voter. A similar approach was used earlier by Herbert McClosky *et al.*,²¹ and on Norwegian material - although without rankings - by Henry Valen and Daniel Katz.²²

As the first approach to an investigation of the dimensionality in the Danish party system we will also use the parties' electorates as unit of analysis and examine the attitude of the net majority on current issues in Danish politics.

We shall here propose the hypothesis that the Danish political parties can be placed upon a right-left continuum on the basis of the dominant attitudes of the voters supporting each of the parties.

As was mentioned, all respondents in the present investigation were asked about their attitude to the possibility of Denmark's entry into the EEC, together with a

question about their attitude on one of four different current issues.²³ Thereafter we investigated whether the voters for each particular party had either a predominantly left- or a predominantly right-oriented attitude in the following way:

Issue	Left-oriented attitude
1. For or against Denmark's membership in the EEC	Against
2. For or against lowering the voting age to 20	For
3. For or against obligatory sex education from the first year in school (age 7)	For
4. Should there be state or private exploitation of the oil found under the North Sea?	State exploitation
5. Should increases in public expenditure be covered by means of income tax or by value-added tax?	Income tax

If left-oriented attitudes are represented by + and right-oriented attitudes by -, the response pattern for the political parties can be illustrated as shown in Table VIII.

Table VIII. Response Pattern on Five Political Issues for Certain Political Parties

Party	Issue number				
	4	2	1	3	5
Left Socialists	+	+	+	+	+
Socialist People's Party	+	+	+	+	+
Social Democrats	+	+	+	-	-
Radical Liberals	+	+	-	-	-
Conservative People's Party	+	-	-	-	-
Agrarian Liberals	-	-	-	-	-

The response patterns in Table VIII are cumulative; we therefore have a Guttman scale, which indicates the existence of a unidimensional right-left continuum for the five parties now represented in parliament and the Left Socialists, who were represented before the election. We have not attempted to locate the Justice Party and the Communists, who have not been represented in parliament in more recent years. A newly formed party, the Christian People's Party, is discussed at the end of section 5. In Table VIII the location of the two left-wing parties with the same response pattern was undertaken after closer investigation of attitudes among the parties' voters.

Table IX shows to what extent there was an excess of left-wing attitudes among the voters of each party. The figures are percentages and represent the differences between the shares of left-wing and right-wing responses (compared with total response) for each issue.

Table IX. Excess of Left-Wing Attitudes on the Five Issues, Differences in Percentages

Party	Issue number									
	4		2		1		3		5	
	+	-	+	-	+	-	+	-	+	-
Left Socialists	85		73		73		61		63	
Socialist People's Party	69		51		77		32		15	
Social Democrats	57		39		15			2		8
Radical Liberals	27		14			31		1		33
Conservative People's Party	1			5		54		13		42
Agrarian Liberals		1		21		64		34		30

On the basis of this placing of parties on the right-left continuum there will, as shown in Table IX, be a continuously declining support for left-wing views as one moves from left to right on the continuum, i.e. going vertically down any column in the Table. Ignoring rounding error, there are only two deviations from this vertical response pattern, for issue 1 and issue 5. The existence of an error in the vertical pattern in issue 5 was decisive in determining the order of the two last issues, which have the same response pattern in Table VIII.

Party Change and Dimensionality

As shown in section 3 approximately three-quarters of all changing voters go to a party perceived as a neighboring party on the right-left continuum (see page 205). The aim of this section is to investigate whether the information to be deduced from the voting change matrices of this study is in conformity with a unidimensional or a multidimensional model of the Danish party system. We use an approach like that of Bo Särilvik in his previously mentioned investigation of the Swedish party system; however, we do not take the analysis as far as Särilvik does, since our main intention is only to put forward hypotheses that can more rigorously be tested on representative samples.

In the analysis below, only the parties represented in parliament are included. Even if the number of respondents of the investigation is over 9000, the absolute number of voting changes for the minor parties is so small that it is not reasonable to make rankings of voting change frequencies on this basis.

By a splitting up on the three districts, the same general pattern seems to appear; however, due to the great differences in party strength in the three districts, the number of voting changes, even for some of the five big parties, will be so small that the analysis cannot be carried through for the same five parties in all three districts.

When we look at changes in party preference from the 1968 to the 1971 election for all respondents as a whole, the ranking of voting change frequencies will be as shown in Table X.

Table X. Party Voting Changes from 1968 to 1971, Ranking of Party Change Frequencies

Party in 1968	Party in 1971				
	F	A	B	C	V
Socialist People's Party (F)	—	1	2	3	4
Social Democrats (A)	1	—	2	3	4
Radical Liberals (B)	3	1	—	2	4
Conservative People's Party (C)	4	3	1	—	2
Agrarian Liberals (V)	4	3	2	1	—

The basic postulate for the analysis is that the voting change frequencies express the party distance; thus, Table X gives the party distances by means of a ranking metric.

Now the distances between parties can be ranked by comparing three parties at a time. We may start, for example, with the Socialist People's Party (F), the Social Democrats (A), and the Radical Liberals (B), and we see from the first row that the distance from F to A — designated as F-A — is smaller than the distance F-B. From the first three rows we draw the following information:

$$\begin{aligned} F-A &< F-B \\ A-F &< A-B \\ B-A &< B-F. \end{aligned}$$

We can now rank the party distances:

$$F-A < A-B < F-B$$

which is not contradicted by any other information from the first three rows. For each ranking we must examine whether the distance between two parties is the same irrespective of the direction in which the party distance is considered. For instance, the distance F-A must be equal to A-F. The partial ranking of distances between parties is shown in Figure 1.²⁴

The configuration of Figure 1 is not complete, as two party distances can be compared only when one party is common for the two distances. It is, for example, possible on the basis of Table X to determine the relation $A-C < A-V$, but it is impossible to say anything about the relation between the two party distances A-C and B-V.

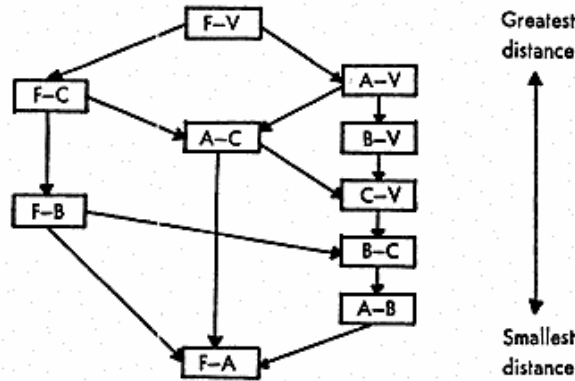


Figure 1. Partial Ranking of Party Distances. (Distance between the two parties at arrowhead is smaller than distance between parties at starting point.)

It appears from Figure 1 that the smallest distance is F-A and the greatest F-V. In Table X the first and last rows show two reverse rankings, and, therefore, we postulate the following sequence on a left-right continuum:

F, A, B, C, V

where the direction of the continuum cannot be determined on the basis of the voting change matrix. Now the question is whether the partial ranking in Figure 1 is consistent with a unidimensional model with the above-mentioned party sequence. A closer examination of the information on party distances in the Figure tells us that this is the case. Hereafter Figure 1 can be simplified according to the unidimensional model, resulting in the configuration of Figure 2.

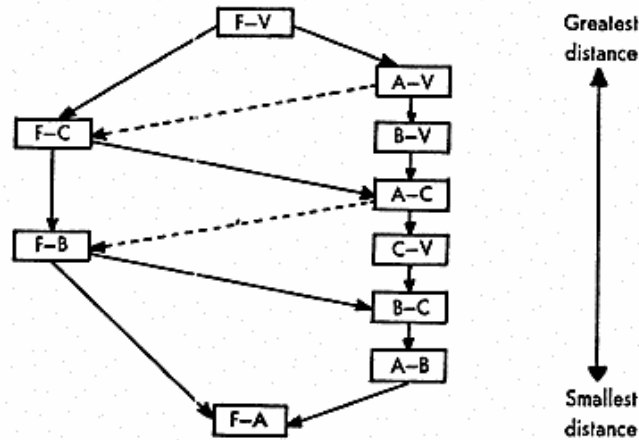


Figure 2. Partial Ranking of Party Distances on the Basis of a Unidimensional Model. (Dotted arrows indicate relations which are consequences of the unidimensional model.)

Table XI. Party Changes from 1968 to 1971, Ranking of Party Change Frequencies

Party 1968	Party 1971				
	F	A	B	C	V
Socialist People's Party (F)	—	2	4	4	4
Social Democrats (A)	1	—	2	3	3
Radical Liberals (B)	2	1	—	1	2
Conservative People's Party (C)	3	3	1	—	1
Agrarian Liberals (V)	4	4	3	2	—

In Figure 2 the ranking relations that are consequences of the unidimensional model are indicated. A-C, for instance, is smaller than B-V. As we know from Figure 1 that

$$A-B < C-V$$

we find that

$$(A-B) + (B-C) < (B-C) + (C-V)$$

resulting in

$$A-C < B-V.$$

At the ordinal scale level it is, however, impossible to say anything about the relation between C-V and F-B, or hence between B-V and F-C either.

Till now the analysis of party changes from 1968 to 1971 has been an outflow analysis, i.e., we have been using the distribution on parties in 1971 when party preferences in 1968 are given. A quite analogous inflow analysis, i.e. an analysis by means of distribution on parties in 1968 at given party preferences in 1971, will now be made on the basis of the column-wise ranking of party change frequencies of Table XI.

The partial ranking of party distances on the basis of Table XI will be as shown in Figure 3.

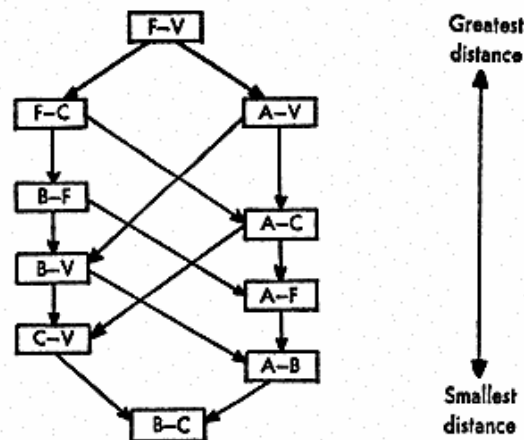


Figure 3. Partial Ranking of Party Distances.

As before, we find that the partial ranking of party distances does not contradict the unidimensional model, but we cannot deduce further information on relative party distances from the configuration in Figure 3 by means of the additivity of the unidimensional model.

Thus we see that if the party changes are divided according to 1) the party the voters go to and 2) the party the voters come from, a unidimensional model can be made for each of these categories, illustrating the average perception of party distances within the two categories. A comparison of Figures 2 and 3 shows, however, that the two models are not identical, which is not consistent with the point of view that all voters perceive the political parties as located in the same way on a unidimensional continuum.

By a closer comparison of the two models we find that the party sequence is the same, viz.:

F, A, B, C, V

whereas the relative distances between neighboring parties of the two models are:

model 1: $F-A < A-B < B-C < C-V$

model 2: $B-C < A-B < F-A$

as $C-V$ of model 2 cannot be compared with all the other three party distances, according to Figure 3.

The differences between the two models seem to be concentrated around the Radical Liberals. By comparing Tables X and XI we find that for the Socialist People's Party, the Conservative People's Party, and the Agrarian Liberals there is a complete agreement between the horizontal and vertical rankings of the voting change frequencies, whereas especially for the Radical Liberals there are important differences (cf. Table XII).

Our material does not allow for further analysis of these problems; it may be mentioned, however, that the voters' attitude toward Denmark's possible entry into

Table XII. Comparison of Ranking of Voting Change Frequencies on the Basis of Outflow and Inflow Values

	Social Democrats		Radical Liberals	
	outflow	inflow	outflow	inflow
Socialist People's Party (F)	1	2	3	4
Social Democrats (A)	—	—	1	2
Radical Liberals (B)	2	1	—	—
Conservative People's Party (C)	3	3	2	1
Agrarian Liberals (V)	4	4	4	3

the EEC may contribute to explaining these differences in the voting change patterns. As shown in section 4 there is, among the opponents to Danish entry into the EEC, a clear tendency to change to a party also opposed to Danish entry. Accordingly the absolute number of voting changes from the Radical Liberals to the Socialist People's Party is higher than all other changes not going to the nearest party. Further, the possibility exists that the considerable gross flows to and from the Radical Liberals as compared with the party's almost constant share of the electorate in 1968 and 1971 is due to the fact that different categories of voters have different perceptions of the party.

Summing up, we can say that on the basis of voting changes it is not possible to describe the Danish party system as a unidimensional system; however, the left-right dimension seems to be the most dominant. This is reflected by the fact that three-quarters of the voting changes go to a party which can be perceived as a neighboring party in the party sequence emerging in both of the two, otherwise incompatible, unidimensional models.

The Emergence of a Christian Party

The election in 1971 was remarkable in that for the first time in a Danish general election a Christian political party participated. The creation of new political parties in Denmark has most frequently occurred by division of existing parties. The Christian People's Party is, however, an exception in that the founders of the party and the party elite consist largely of people without notable earlier political careers. The direct cause of the formation of the party was a protest about two areas of legislation: 1) the removal of restrictions on pornography, including the removal of film censorship, and 2) a liberalizing of access to legal abortion (the bill on introduction of obligatory sex education from the first year in school also played an important role). This legislation was carried through by the coalition government consisting of the Radical Liberals, the Conservatives, and the Agrarian Liberals. Remarkably enough, the Minister of Justice was a Conservative, elected in an area where the opposition to this legislation was at its most vocal.

The Continental Christian parties can be considered sister parties to the Danish Conservative People's Party, while the Christian People's Party can best be compared with the Norwegian party of the same name. If the Christian People's Party were placed on a left-right scale, as in Table VIII, the party would be coincident with the Conservative People's Party: They both have the response pattern + - - - -. However, differences between the two parties would appear most clearly in connection with Table IX, where there would be many errors in the vertical response pattern. The party would here, on the different issues, be placed alternately above and below, i.e. to the right or to the left, of the Conservatives. The particular party line is mirrored in an almost unanimous disagreement with introduction of obligatory sex education from the first year in school, issue number 3.

If we assume, as we did earlier, that the individual voter will vote for the party located nearest to himself, and we then place the Christian People's Party in a position that corresponds by and large to that of the Conservatives, then we can expect that most of the Christian People's Party voters will be former Conservatives. However, because of bad placement in relation to the vertical pattern in Table IX, we must also expect a gain from the Radical Liberals and from the Agrarian Liberals. As shown in Tables II-IV, this prediction holds perfectly.

As the Christian People's Party has participated in only one general election it is impossible to analyze this voting change pattern with a view to establishing relative party distances, as has been done on pp. 206 ff. The almost unanimous opposition among the party's voters to the introduction of obligatory sex education from the first year in school – as compared with the attitudes on the other four issues – may be interpreted as indicating the existence of a religious-moral dimension otherwise hardly discernible in an analysis of voting change tendencies in Danish politics.

6. Summary

On the basis of voting data on total electorates in three polling districts, the main intentions of this article have been: first to describe the voting change patterns in the three districts and second to put forward supported hypotheses for a later, more rigorous testing on a representative sample of voters in the entire political system.

Among these hypotheses we may mention: 1) the attitude on an important issue in an election campaign – in this case the question of Denmark's possible entry into the EEC – can be clearly traced in the voting change pattern, and 2) in spite of indications of multidimensionality, the left-right dimension is by far the most important dimension in the Danish party system.

NOTES

1. Their last publication was Ole Borre and Jan Stehouwer, *Fire Folketingsvalg, 1960-68*, Aarhus: Akademisk Boghandel, 1970 (with a summary in English).
2. See Hans Jørgen Nielsen, 'Voting Age of 18 Years. Adopted by the Danish Folketing, Rejected by the Popular Referendum', *Scandinavian Political Studies*, Vol. 5, Oslo: Universitetsforlaget, 1970, pp. 301ff.
3. M. van Dam and J. Beishuizen, *Kijk op de kiezer*, Amsterdam: Parool Pockets, 1967.
4. Ole Riis, 'Folkeafstemningen om 18 års valgret', *Økonomi og Politik* 43 (1969), pp. 215-232.
5. Ole Riis has written about this study in Borre and Stehouwer, *op. cit.*, pp. 217-220. See also Ole Riis, 'The Local Council Elections in Denmark 1970', *Scandinavian Political Studies*, Vol. 6, Oslo: Universitetsforlaget, 1971, especially pp. 224-227.
6. E.g. two integrated studies of electoral behavior were in preparation at the political science institutes in Copenhagen and Aarhus. The larger of these surveys is based on a nationwide sample. It is carried out by a group consisting of Hans Jørgen Nielsen, Steen Sauerberg, and Torben Worre, all of Copenhagen, and Ole Borre, Erik Damgaard, and Ole

- Tonsgaard*, all of Aarhus. The other study is carried out by *Jørgen Elklit, Johan Peter Noack*, and *Ole Tonsgaard*, all of Aarhus, in the nationally mixed-up area of southern Jutland, the only part of the country where the German Minority Party is running at the elections. It is hoped that preliminary results of both studies can be published in 1972 or early 1973.
7. See e.g. Henry Valen and Willy Martinussen, *Velgere og politiske frontlinjer*, Oslo: Gyldendal Norsk Forlag, 1972, p. 280.
 8. We must admit that tiny changes have been made in the cases of Hammerum and Enghave.
 9. The official results from the three voting districts have kindly been reported to us by *Danmarks Statistik*. Results on constituencies and larger units are for the time being to be found in 'Folketingsvalget den 21. september 1971', *Statistiske Efterretninger* 63, 74 (5 October 1971), pp. 1141-1168. See also the review article in this yearbook by Ole Riis, pp. 251-258.
 10. See Jens Jeppesen and Poul Meyer, *Sofavælgerne* (Electoral Turnout in Denmark), Aarhus: Institut for Statskundskab, 1964. This study is based on those voters who were residents of the same election district at two successive elections, 1957 and 1960.
 11. This point has been stressed by a critique of the whole study; see Ernst Andersen, 'Analyse af TVA-valganalysen: Hvad var den værd?', *Liberal*, 8 (1971), pp. 53-56.
 12. See the preliminary report in Danish: Ole Borre, Jørgen Elklit, Ole Riis and Ole Tonsgaard, *TVA's valganalyse af folketingsvalget den 21. september 1971 i Hammerum, Dalum og Enghave*, Århus, November 1971 (mimeo), section 3.
 13. Donald E. Stokes, 'Spatial Models of Party Competition', *American Political Science Review* 57 (1963).
 14. Philip E. Converse, 'The Problem of Party Distances in Models of Voting Change', in M. Kent Jennings and L. Harmon Zeigler (eds.), *The Electoral Process*, Englewood Cliffs, N.J.: Prentice-Hall, 1966.
 15. Cited in Harald Swedner, *Sociologisk Metod*, Lund: Gleerups, 1969, pp. 181-182.
 16. Bo Särilvik, 'Partibyten som mått på avstånd och dimensioner i partisystemet', *Sociologisk Forskning* 5, 1 (1968).
 17. Mogens N. Pedersen, Erik Damgaard and P. Nannestad Olsen, 'Party Distances in the Danish Folketing 1945-68', *Scandinavian Political Studies*, Vol. 6, Oslo: Universitetsforlaget, 1971.
 18. Mogens N. Pedersen *et al.*, *op. cit.*, p. 102.
 19. Hans Jørgen Nielsen, 'Forskelle mellem politiske partier?', *Økonomi og Politik* 43, 2 (1969), pp. 156-164.
 20. Mogens N. Pedersen *et al.*, *op. cit.*, p. 90.
 21. Herbert McClosky, Paul J. Hoffmann and Rosemary O'Hara, 'Issue Conflict and Consensus among Party Leaders and Followers', *American Political Science Review* 54, 2 (1960), pp. 406-427.
 22. Henry Valen and Daniel Katz, *Political Parties in Norway*, Oslo: Universitetsforlaget, 1964, p. 259.
 23. The fifth of the alternating questions concerned the relative popularity of the two leading politicians, Mr. Krag and Mr. Baunsgaard.
 24. We use the same way of graphic representation as does Bo Särilvik, *op. cit.*, p. 55.