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Recent Mortgage Market Developments in  
Sweden and Denmark

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Recent Mortgage Market Developments in Sweden and Denmark

In 1966, policies of general credit restraint continued in force in both Sweden and Denmark, but residential construction activity was not adversely affected to any significant degree in either country. However, mortgage markets in both countries were under severe strain and increased assistance from the authorities was required. This assistance was provided even though it was contrary to the generally restrictive credit policies because housing is a high priority social goal in both Sweden and Denmark.

The cost of mortgage borrowing increased in both countries in 1966. In Sweden higher mortgage bond yields reflected primarily a discount rate increase at mid-year. However, in Denmark the rise in borrowing costs was due chiefly to the shortage of funds on the bond market.

The authorities in both countries moved to help the mortgage markets, though the scope and techniques of assistance differed. In Sweden, the Bank of Sweden authorized substantially larger mortgage bond issues, public institutions' purchases of mortgage bonds increased sharply and the central government increased its direct mortgage lending moderately. In Denmark, where the authorities were trying to reduce residential construction activity--by contrast with the situation in Sweden--the official assistance was confined to substantial market purchases of mortgage bonds by the National Bank of Denmark.

In 1967, mortgage markets in Sweden and Denmark will be operating under different financial conditions. In Sweden mortgage bond yields have declined by nearly one percentage point as a result of the reversal of the restrictive credit policy. In Denmark, by contrast, mortgage bond yields have declined only marginally thus far, and the discount rate is unchanged at 6-1/2 per cent. Construction activity in 1967 may show some lagged effects of financial stringency in 1966 even though opposite credit policies are now being followed. In Denmark, a 10 per cent cut in housing starts is expected, while in Sweden the current easing of financial conditions will take some time to be reflected in higher levels of residential construction activity.

A. Sweden

Severe housing shortage continues through 1966

The year 1966 brought little relief to Sweden's difficult housing situation. In the decade ended in 1965, over 775 thousand dwelling units were constructed, but serious shortages continue to exist in most urban areas and waiting lists are growing rather than diminishing. At the present time, the waiting period for apartments in Stockholm and other major urban centers is reportedly 8 to 10 years.

Housing has one of the top priorities among the country's social goals and the revised 1966 government budget set a target of 95 thousand dwelling units starts for calendar 1966. However, by

mid-summer, housing starts were 17 per cent below the corresponding period of 1965 (see Table 1) and it was apparent that, in the absence of official assistance, there would be a serious shortfall in housing starts for the year.

Table 1. Sweden: Housing Starts and Completions, 1964-1966  
(thousands of dwelling units)

<u>Year and Quarter</u>	<u>Starts</u>				<u>Completions</u>	
	<u>Apartment Blocs</u>	<u>1- and 2-Family Houses</u>	<u>Total Starts</u>	<u>Annual Total</u>	<u>Quarterly</u>	<u>Annual Total</u>
1964 - I	8.4	3.6	12.0		19.8	
II	21.2	9.4	30.6		21.9	
III	23.1	8.2	31.3		18.4	
IV	14.8	7.6	22.4	96.3	27.0	87.1
1965 - I	11.2	3.8	15.0		21.4	
II	14.3	9.7	24.0		26.1	
III	14.2	6.8	21.0		19.0	
IV	25.9	7.0	32.9	92.9	30.1	96.6
1966 - I	9.8	3.2 <sup>e/</sup>	13.0		21.6	
II	11.0	8.5 <sup>e/</sup>	19.5		23.0	
III	15.2	6.8 <sup>e/</sup>	21.7		17.4	
IV	n.a.	n.a.	39.2 <sup>p/</sup>	93.4 <sup>p/</sup>	36.4 <sup>p/</sup>	89.4 <sup>p/</sup>

<sup>e/</sup> Estimated.

<sup>p/</sup> Provisional.

Sources: Preliminary National Budget 1967, Secretariat for Economic Planning, Stockholm, 1967; Affärsvärlden-Finanstidningen, No. 8, February 8, 1967.

The slowdown in housing starts in the first half of 1966 reflected primarily three factors. First, in the interest of anti-inflationary stabilization policies, the Bank of Sweden continued to

restrict access to the bond market; as in previous periods of strain, building credits tended to become "frozen" in Swedish commercial bank accounts because the inability of mortgage institutions to market bonds prevented the orderly conversion of building loans into long-term mortgages. Second, the unprecedented cold winter weather intensified the influences of restrictive credit conditions; and, third, housing starts were also affected by various administrative measures--mainly building permits rationing--applied late in 1965.

The Riksbank took two steps to assist the housing market. First, coincidentally with the one-half per cent increase in its discount rate in June 1966, coupon interest rates on mortgage bonds were permitted to rise from 6.25 per cent to 6.75 per cent. Secondly, in late August the rate of authorization of new mortgage bond issues was accelerated sharply. Between August 24 and mid-November 1966, issues of kr. 2 billion were authorized by the Bank--nearly one-half of the total amount of kr. 4,183 million issued during the entire year. (See Table 2.) It is probable that this last substantial assistance to the housing market was, at least in part, politically motivated--local elections were held in Sweden in September and the government was severely criticized in the election campaign for the poor performance of the housing industry.

The new issues authorized were also instrumental in increasing the availability of construction credits from commercial banks. Swedish commercial banks are permitted to treat mortgage bonds in their investment portfolios as liquid reserves; each new mortgage bond issue authorization

Table 2. Sweden: Bond Issues by Mortgage Institutions, 1963-1966  
(gross at nominal value, millions of kronor)

<u>Year</u>	<u>Q-I</u>	<u>Q-II</u>	<u>Q-III</u>	<u>Q-IV</u>	<u>Year</u>
1963	360	265	550	184	1,359
1964	390	1,130	250	1,105	2,875 <sup>1/</sup>
1965	30	680	930	463	2,103 <sup>2/</sup>
1966	595	1,135	1,070	1,381	4,183 <sup>3/</sup>

<sup>1/</sup> Including kr. 305 million refunding.

<sup>2/</sup> Including kr. 121 million refunding.

<sup>3/</sup> Including kr. 57 million refunding.

Source: Riksbankens Förvaltningsberättelse för år 1966.

by the Riksbank is customarily preceded by an agreement between the Riksbank and commercial banks, whereby commercial banks undertake to advance additional construction credits equal to their purchases of new mortgage bonds.

Construction industry responded well to these stimuli. Housing starts in the last quarter of the year accounted for 42 per cent of all starts in 1966 and the 93.4 thousand starts in 1966 were 5 per cent above the 1965 figure of 92.9 thousand dwelling units started.

Mortgage market's increased reliance on the bond market

The high social and political priority given to housing in Sweden led to somewhat paradoxical developments in the Swedish capital market in 1966. The continuing inflationary pressure--the Swedish consumer price index rose by 6.3 per cent during the year--was one of

the chief factors in forcing the Riksbank to raise its discount rate in June. However, sagging housing starts caused the Bank to open up access to the bond market spectacularly in the second half of the year: the total mortgage bond issues were almost 100 per cent above the 1965 level, even though they were only 45 per cent above the previous all-time high of 1964. (See Table 2.)

Mortgage loans granted by the private sector increased from kr. 4,600 million in 1965 to kr. 5,250 million (in current prices), or by 14 per cent. (See Table 3.) However, in constant 1950 prices the increase was somewhat smaller: from kr. 2,278 million in 1965 to kr. 2,484 million in 1966, or by just under 9 per cent. The absolute increase in loans granted on essentially the same amount of construction reflects the higher value of units constructed in 1966.

Table 3. Sweden: Mortgage Loans on Residential Construction  
Granted by the Private Sector, 1965-1966  
(millions of kronor-current prices)

<u>Lender</u>	<u>1965</u>	<u>1966</u>
Commercial Banks <sup>1/</sup>	1,150	800
Other Credit Institutions <sup>2/</sup>	3,450	4,400
(of which bonds purchased by the National Pensions Insurance Fund)	(1,225)	(2,350)
Private Lenders	0	50
Total	4,600	5,250

<sup>1/</sup> Includes purchases of mortgage bonds by commercial banks as well as direct mortgage loans by the banks.

<sup>2/</sup> Includes specialized mortgage banks and institutions, savings banks, Post Office Savings Bank, insurance companies and other minor credit institutions.

Sources: Konjunkturinstitutet, Stockholm: The Swedish Economy, 1965 and 1966.

The relative weakness of direct savings inflow as a source of mortgage funds in 1966 can be seen in the contribution the bond market made to the mortgage market in the past two years. In 1965, the bond market provided kr. 2,103 million or 46 per cent of mortgage loans granted in that year; in 1966 the bond market's contribution was kr. 4,183 million, or nearly 80 per cent of that year's mortgage loans. (See Tables 2 and 3.) The successful fund raising on the bond market was made possible only by the substantially increased purchases of mortgage bonds by the National Pensions Insurance Fund (Allmänna pensionsfonden). In 1965 the Fund purchased kr. 1,225 million worth of mortgage bonds and thus provided 27 per cent of mortgage loans granted in the year; in 1966 the Fund's purchases of bonds increased to kr. 2,350 million and it provided 45 per cent of loan funds.

The official policy of credit restraint is reflected in mortgage bond yields. Coupon rates on new bonds were increased, with the Riksbank's consent, from 6.25 to 6.75 per cent in June 1966. Yields on mortgage bonds (see Table 4) increased fairly sharply, though irregularly, at mid-year and then declined slowly as credit conditions eased. However, at year-end average mortgage bond yields were still about 34 basis points above the level at the beginning of the year.

#### Increased government financial assistance

Over 80 per cent of all new construction in 1966 had been given some sort of government assistance. The mortgage market is assisted by the Central Government in three main ways:

(1) Direct lending. First and second mortgage loans granted by the private and semi-public sector cannot legally exceed 70 per cent of house costs. Over 80 per cent of all dwelling units constructed in 1965 and 1966 received additional financing from the government on third

Table 4. Sweden: Yields on Selected Bonds, 1965-1966  
(quarterly and annual averages, in per cent per annum)

<u>Year and Quarter</u>	<u>Mortgage Banks (Hypotheksbankens) 4-1/2 Per Cent Bonds</u>	<u>Public Mortgage Banks (Stadshypothekskassans) 3 Per Cent Bonds</u>	<u>Building Credit Institutions (Bostadskreditkassans) 5.75 Per Cent Bonds</u>
1965 - I	6.12	5.03	6.06
II	6.50	5.28	6.20
III*	6.50	5.30	6.21
IV	6.51	5.30	6.19
(Annual Average)	(6.38)	(5.24)	(6.16)
1966 - I	6.70	5.39	6.21
II	6.76	5.28	6.25
III*	6.89	5.88	6.33
IV	6.88	5.62	6.30
(Annual Average)	(6.81)	(5.30)	(6.27)

\* In the period covered by the table, the Bank of Sweden raised discount rate twice: from 5 to 5-1/2 per cent on April 9, 1965, and from 5-1/2 to 6 per cent on June 9, 1966.

Source: Calculated from average weekly yields published in Affärsvärlden, Stockholm, 1965 and 1966.

mortgage; this increased the percentage of mortgage financing to between 85 and 90 per cent of cost. The figures for government lending activities are published on a fiscal year basis (July 1 to June 30) only, but it appears that the government loans increased in 1966 by about 20 per cent from the preceding year. (See Table 5.)

(2) Building subsidies. If the house meets certain floor space and equipment requirements, certain percentages of the government loan (up to a ceiling of kr. 4,000) become non-interest bearing, non-repayable subsidies.

(3) Interest subsidies. In certain low-income housing, the government subsidizes mortgage loan interest payments by the house buyers. The government pays the differential between 3-1/2 per cent (first mortgage loans) and 4 per cent (second mortgage loans), and the actual rate of interest paid by the borrower.

Apart from the above three direct methods of financial assistance, the government's activities also affect the housing market through the system of rent controls and rent subsidies. The former have been criticized in Sweden on the grounds that they adversely affect the supply of privately constructed apartment blocks for rent.

Table 5. Sweden: Government Mortgage Loans and Subsidies, 1966-1968  
(millions of kronor)

<u>Fiscal Year</u> <u>(July 1 - June 30)</u>	<u>Third Mortgage Loans</u>		<u>Building and</u> <u>Interest</u> <u>Subsidies</u>
	<u>Gross</u>	<u>Net of</u> <u>Amortization</u>	
1965-66	1,506	1,156	250
1966-67 <sup>p/</sup>	1,860	1,460	235
1967-68 <sup>e/</sup>	1,860	1,410	225

<sup>p/</sup> Partly estimated.

<sup>e/</sup> Estimated in preliminary budget.

Source: Finanstidningen, Stockholm, December 12, 1966.

### Prospects for the future

Long-term plans of the government call for construction of one million dwelling units during the decade 1966-1974 (775 thousand were constructed during the preceding decade). However, the preliminary budget estimates for 1967 set a target of only 90 thousand starts during the year. Since the 1966 starts were also below the average of 100 thousand called for by the long-term plan, it would appear that a substantially larger effort will have to be made in the later years of the decade.

Some steps have already been taken to assist housing construction. Building permits for non-residential and non-essential construction (summer houses, etc.) will be severely rationed in 1967. The Riksbank made arrangements with commercial banks and insurance companies designed to ensure a stable, sufficient flow of construction credits and mortgage funds to the market during the year. Recent reports indicate that the National Pensions Insurance Fund intends to continue its substantial role in the mortgage bond market. Finally, legislation is being prepared, and will shortly be presented to the Parliament, for far-reaching reforms leading to abandonment of rent controls and rent subsidies.

### B. Denmark

#### Demand for housing increasing

The demand for housing in Denmark, which continued very strong through the post-war period, did not show signs of abating in 1966. In fact, housing starts increased from 41.5 thousand dwelling

units in 1965 to 50.0 thousand in 1966, or by 20 per cent. (See Table 6.) The figure of 50 thousand starts is an all-time high for Denmark; it was reached in 1966 in the face of the official policy of credit restraint and the efforts of the authorities to slow down building activity.

Table 6. Denmark: Residential Housing Statistics, 1964-1966  
(thousands of dwelling units)

<u>Year</u>	<u>Housing Starts</u>		<u>House Completions</u>		<u>Under Construction End of Period</u>
	<u>Half-Year</u>	<u>Annual</u>	<u>Half-Year</u>	<u>Annual</u>	
<u>1964</u>					
Jan.-June	22.5		17.5		43.2
July-Dec.	23.5	46.0	21.4	38.9	45.2
<u>1965</u>					
Jan.-June	23.9		18.6		50.4
July-Dec.	17.6	41.5	21.9	40.5	46.2
<u>1966</u>					
Jan.-June	24.5		19.3		51.3
July-Dec.*	25.5	50.0	20.3	39.6	56.6

\* Provisional figures.

Source: Statistiske Efterretninger, February 28, 1967, p.3.

In 1958, the Danish government started to exercise fairly substantial quantitative control over the housing market by administering quotas on building permits. This system was highly unpopular and only partially successful in achieving the desired deflationary effects. Late in 1964, the restrictions were considerably relaxed and the quotas finally abolished in March 1966. However, the system of quota rationing

was superseded by severe restrictions on mortgage loan increases administered by the National Bank of Denmark under an Agreement of June 1966. This Agreement was concluded between the Bank and the Danish mortgage institutions--under a threat of parliamentary legislation--and it froze new mortgage loans granted by institutions issuing mortgage bonds at 110 per cent of loans granted in the basic period from April 1, 1964 to March 31, 1965. The limitations on mortgage loans are a part of the general credit restraint measures of the National Bank; similar loan restrictions are placed on agricultural and commercial loans. Originally, the Agreement was scheduled to run through March 1967, but in October 1966 it was extended to March 1968. No restrictions, however, are in force on mortgage loans granted by institutions relying on direct savings inflow, such as savings banks, which do not issue mortgage bonds.

The restrictive measures of the National Bank were clearly not very effective in 1966. However, the 20 per cent increase in housing starts was in part due to very heavy mortgage commitments entered into just prior to the Agreement deadline in mid-June 1966. These forward commitments, amounting to some kr. 3 billion, are now worked out and the authorities look forward to a decline of about 10 per cent in housing starts in 1967.

House completions declined from 40.5 thousand dwelling units in 1965 to 39.6 thousand in 1966, or by about 2 per cent. Housing starts in Denmark are financed by a conventional construction loan through a

commercial bank, and these are subsequently converted into long-term mortgage loans with a maximum maturity of up to between 50 and 60 years. The conversion normally takes place upon completion of the building; however, the liquidity difficulties of the Danish commercial banks forced them in 1966 to insist on a "step" conversion of the construction loans into mortgage loans as progress payments were made to the builder. This new system was started in mid-1965 and it seems probable that the difficulties of the bond market in 1966 slowed down the rate of house completions.

Bond market in difficulties, yields reach historic highs

The Danish mortgage market has a unique structure, which had a beginning in 1850 when mortgage credit associations were first established. Over three-quarters of mortgage loans in Denmark are granted not in cash, but in bonds of the lending institution. The borrower actually becomes a member--and co-owner--of a credit association (granting first mortgage loans) and a mortgage society (granting second mortgage loans). In return for the deed to the property and an appropriate installment payments contract, he is given his institution's mortgage bonds. The face amount of the bonds equals the nominal value of the loan, but the borrower can only raise cash by selling the bonds on the bond market for the best obtainable price. Because the first and second mortgage loans normally cover only 70 per cent of total costs, home buyers in virtually all cases obtain a third mortgage loan

(from a mortgage fund) covering (at face value of the bonds) an additional 15 to 25 per cent of total costs. The bonds of the mortgage fund have also to be sold on the bond market.

The policy of credit restraint enforced in 1966 placed the Danish bond market (mortgage bonds account for nearly 85 per cent of all bonds outstanding in Denmark) under severe strain. Despite the ceilings placed on new mortgage bond issues by the National Bank (see above), the market was not able to generate funds at the necessary rate and discernible shifts between lending institutions occurred in 1966. Mortgage loans granted in cash--by savings banks and commercial banks--which accounted for 16 per cent of all loans in 1965 increased to 25 per cent of loans granted in 1966. (See Table 7, Part I.) At the same time, loans granted by bond issuing institutions declined from kr. 6,928 million in 1965 to kr. 5,433 million in 1966, or by 22 per cent.

The yields on mortgage bonds, already very high in 1965, increased further in 1966. Average yields on mortgage bonds--weighted by their share of the market--increased from 9.53 per cent in 1965 to 9.61 per cent in 1966, or by over 8 per cent; yields on third mortgage bonds with 5-1/2 per cent coupon rate reached historic highs for Denmark of 10.45 per cent in October-November 1966. (See Table 8.) The very high yields on mortgage bonds increased

Table 7. Denmark: Mortgage Loans Granted and Sources of  
Mortgage Funds, 1965-1966  
(in millions of kroner)

	<u>1965</u>	<u>1966</u>
<b>I. <u>Net Mortgage Loans Granted During Year</u></b>		
<b>A. Institutions granting loans in bonds:</b>		
Credit Associations (1st mortgage)	4,364	3,345
Mortgage Societies (2nd mortgage)	806	661
Mortgage Funds (3rd mortgage) <sup>1/</sup>	<u>1,758</u>	<u>1,427</u>
Total	6,928	5,433
<b>B. Institutions granting loans in cash:</b>		
Major Savings Banks <sup>2/</sup>	768	1,209
Commercial Banks <sup>3/</sup>	<u>577</u>	<u>611</u>
Total	1,345	1,820
<b>Total mortgage loans granted, face value (A + B)</b>	<u><u>8,273</u></u>	<u><u>7,253</u></u>
<b>II. <u>Sources of Mortgage Funds</u></b>		
Cash amounts received by mortgagors from market sales of mortgage bonds (nominal value of mortgage bonds sold) <sup>4/</sup>	4,033 (6,721)	2,974 (5,017)
Direct savings inflow to savings and commercial banks utilized for mortgage loans	1,345	1,820
Additional downpayments by mortgagors cover- ing discounts on bond sales <sup>4/</sup>	<u>1,895</u>	<u>2,563</u>
<b>Total sources of funds</b>	<u><u>8,273</u></u>	<u><u>7,253</u></u>

<sup>1/</sup> Includes small amount of loans granted by the Mortgage Bank for Danish Agriculture.

<sup>2/</sup> Excludes Faroese banks; includes savings banks with deposits in excess of kr. 5 million, which control over 95 per cent of all deposits.

<sup>3/</sup> Excludes Faroese banks.

<sup>4/</sup> Average discounts on mortgage bonds:

	<u>1965</u>	<u>1966</u>
1st mortgage bonds	36.9%	37.2%
2nd mortgage bonds	45.5	45.4
3rd mortgage bonds	45.4	46.6

Sources: Statistiske Efterretninger, v.59, No. 5, February 3, 1967.  
National Bank of Denmark Monthly Review, February 1967.

the already substantial discounts at which these bonds could be sold on the market by the mortgagors; weighted average discounts on mortgage bonds increased from 38.9 per cent in 1965 to 39.5 per cent in 1966, or by over 15 per cent.

Table 8. Denmark: Selected Bond Yields, 1965-1966  
(quarterly and annual averages, in per cent per annum)

<u>Year and Quarter</u>	<u>1st Mortgage 6 Per Cent Bonds</u>	<u>2nd Mortgage 5 Per Cent Bonds</u>	<u>3rd Mortgage 5-1/2 Per Cent Bonds*</u>	<u>Government 5 Per Cent Bonds</u>
1965 - I	8.97	8.50	9.69	7.55
II	9.58	9.21	10.02	8.20
III	9.67	9.53	10.26	8.49
IV	9.76	9.40	10.29	8.70
(Annual average)	(9.50)	(9.17)	(10.07)	(8.24)
1966 - I	9.59	9.07	10.08	8.71
II	9.50	9.08	10.26	8.79
III	9.40	9.05	10.44	8.74
IV	9.65	9.33	10.42	9.05
(Annual average)	(9.55)	(9.15)	(10.30)	(8.82)

\* Includes agricultural fund bond issues (not very significant).  
Source: Statistiske Efterretninger, February 28, 1967, p. 31.

These almost catastrophically high discounts on mortgage bonds forced the National Bank of Denmark to increase sharply its market bond purchases in support of bond prices. The Bank purchased kr. 246 million in 1964, kr. 1,291 million in 1965, and kr. 839 million in 1966. The unusually high purchases in 1965 reflect the increased bond issues resulting from pre-Agreement forward loan commitments referred to earlier. It is clear that, in the absence of the Bank's

price support--the Bank's mortgage bond purchases in 1966 accounted for 28 per cent of cash raised by the bond market for mortgage loans--the bond yields and discounts would have been much higher.

The National Bank of Denmark expressed repeated concern over the inflationary effects of its bond price support activities--prices in Denmark rose by about 6 per cent in 1966--but it clearly felt that housing had priority even with its deflationary program.

Downpayments on houses increase sharply

The high level of discounts on mortgage bond sales in 1966 placed additional financial burdens on home buyers. In theory, the downpayment on houses in Denmark should range from 10 to 15 per cent and could even be lower in some isolated cases. However, the additional downpayments by home buyers, needed to cover discounts on bond sales, increased from kr. 1,895 million in 1965 to kr. 2,563 million in 1966, or by 35 per cent. (See Table 7, Part II.) Actual downpayments by home buyers in 1966 appear to have ranged from 30 to 40 per cent.

The very high yields on mortgage bonds--75 per cent of which are held by individuals--enable savers to accumulate funds quite rapidly, and home buyers evidently feel that the high rate of inflation (Denmark has had the highest consumer price increases in Europe in the 1960's) will continue and that the high cost of mortgage borrowing will not be an excessive burden in future years.