# 11 The rise of the modern state: I. Quantitative data

The rise of the modern state is a commonplace of sociological and historical writing, yet it remains poorly analyzed. What is meant by state modernization encompasses four processes of growth: in state size, in the scope of its functions, in administrative bureaucratization, and in political representation. The struggle for representation is usually separated from the three administrative processes, which are assumed to constitute a single, overall modernizing process occurring more or less continuously over a long period of time (e.g., Beer 1973: 54–70; Eckstein 1982). In 1863, Adolf Wagner formulated his "law" of the ever growing expansion of the modern state, and this still influences statisticians contemplating ever larger sums in state budgets (e.g., Andic and Veverka 1963–4). Modern state development is described as "onward-and-upward" evolution.

Political scientists and economists have concentrated on the readily available financial statistics of the twentieth century. They explain growth in functional and pluralist terms. Higgs (1987) distinguishes four variants of their theories: modernization theory (states grew to coordinate greater social complexity and differentiation), public goods theory centered on national defense (public goods are provided by the state because they are in no one's private interest to pay for, yet are in the general interest, and their enjoyment by one consumer does not diminish their availability for others), welfare state theory (in complex societies the market undermines private charity and the state steps in), and political redistribution theory (the franchise enables the many to take from the few). Higgs shows that growth in the United States during the twentieth century has been more uneven than any of these four theories suggests. Rather, growth has been propelled by the ratchet effect of three great crises: two world wars and the Great Depression. These crises swung political ideologies toward state intervention (Peacock and Wiseman 1961 make the same point for Britain) and this, combined with entrenched bureaucratic interests (a borrowing from true elitist state theory), acted to prevent a return to lower levels of government.

The role of war in expanding states is very old, but whether it can be subsumed under a more general notion of "crisis" is questionable (Rasler and Thompson 1985 also make this point). Presumably social and economic crises apart from war had occurred before 1850. But they

did not fuel state growth. Only war did this before 1850. The political interventionist response to the Great Depression seems peculiar, not part of a general phenomenon. Almost for the first time in history subordinate social classes demanded what Marshall called "social citizenship." Apart from war, nineteenth-century state growth was not a response to crisis. Higgs, to his credit, acknowledges this and concludes, "The development of Big Government was not a matter of logic, however complicated and multidimensional, but of History....[R]eal political and socioeconomic dynamics are 'messier,' more open to exogenous influences or shocks and less determinant in their outcomes than the theorists suppose" (1987: 259). He is right. His four theories of state growth share the defects of all pluralist state theories. States do not systematically reflect their societies; they do not simply perform an underlying modernization, public goods, welfare, redistribution, or even crisis function. Nor do they systematically reflect a dialectical class struggle or the interests of state elites. They do all of these - and more - amid institutional and functional complexity that requires careful analysis.

Weber also had a systemic theory of state growth: It was part of a single "rationalization process" sweeping for centuries throughout the West. He feared the "overtowering" power of a bureaucratic state of ever increasing size and scope, and he referred briefly to three distinct causes of this state growth: the linked needs of a standing army, uniform law and taxation, the needs of capitalist enterprises for uniform technical and predictable services, and the pressure exerted by citizenship for uniformity of treatment. This was perceptive, but Weber subordinated this analysis to an essentially onward-and-upward story (though he wasn't sure he liked its outcome).

True elitist state theory (see Chapter 3) also tells an essentially onward-and-upward tale of growth. For Poggi (1990), this has been powered by the state's own "invasive" tendencies, though interacting with class and pluralist mechanisms and with some contingencies added. Skocpol (1979) provides a more discontinuous true elitist theory. She argues that revolutionaries from 1789 on increased state size, scope, and bureaucratization together (another version of Higgs's crisis theory). (I cast doubt on her explanation in Chapter 13.) Giddens merges Weber with Foucault (1975) to describe the rise of an all-powerful, all-surveilling, all-disciplining nation-state, which he believes is the greatest "power-container" of the modern world. It "absorbs" and actually "is" society (1985: 21–2, 172). But he is not too specific about precisely when and where this Leviathan emerged. Nor does he or Foucault make clear who this Leviathan is: Who controls it? Who is doing what to whom? Is there, in fact, a state elite in charge?

Marxists give an onward-and-upward account in terms of the development of capitalism. They point not to an "overtowering state" but to an ever expanding capitalism. Marx himself did not seriously analyze states, but he spiced descriptions of French and German states with Victorian diatribes against "bloated bureaucracies." He described the French state as "this appalling parasitic body, which enmeshes the body of French society like a net and chokes all its pores" (1968: 169). The tables in this chapter show that the French state was no larger than other European states of the period. Later Marxists invariably write of the "capitalist state." Miliband (1969) opens his book thus: "The vast inflation of the state's power and activity in the advanced capitalist societies . . . has become one of the merest commonplaces of political analyses." His title, The Capitalist State, reveals his explanation for this inflation. Wolfe's history of the capitalist state attributes growth and bureaucratization to the needs of concentrated, centralized capital for predictable, rationalized public goods and for an apparently neutral agency to regulate class struggle and to soften it with welfare reforms (1977: 59-79, 263). His history, like almost all Marxist accounts, barely mentions the state's military activities.

Such onward-and-upward stories reflect confidence that the state grew massively over this period. A few scattered numbers are generally marshaled in support (e.g., Poggi 1990: 109-11). Some refer to continuous growth in the number of state officials (e.g., Anderson and Anderson 1967), often citing Flora's (1983) compilation of historical statistics of public employment. The invaluable fiscal compilations of Bruce Mitchell (1975, 1983; Mitchell and Deane 1980) are also cited. They show enormous growth in the cash disbursements of most Western states throughout the period. The fiscal historian Gabriel Ardant has claimed further that state expenditures grew as a proportion of gross national product, even though that was considerably expanding, throughout the nineteenth century (1975: 221). After briefly presenting both types of statistics and acknowledging some of the unevenness of nineteenth-century growth, Grew (1984) moves to his main questions: Why was there so much state expansion in the nineteenth century, and why was it so strikingly similar in such different countries? Grew seems confident that states just grew and grew.

But did they? In this chapter, I present systematic quantitative data on state finances and employment to separate carefully size, scope, and bureaucratization to see which increased, when, and where. The rise of the modern state was a differentiated, complex, and uneven process. Rather surprisingly, the state did not become larger in relation to its civil society over the "long nineteenth century." Yet this overall lack

of a trend confuses three processes – a declining but increasingly insulated military, an increase in bureaucracy, and a large increase in civilian scope. Each of these three is then analyzed in its own chapter.

For the five countries, I have gathered systematic data on size, scope, and bureaucratization for both central and regional-local government all levels of government below the central or federal level. In the Austrian lands, "central government" before 1867 refers only to government in Vienna; after 1867, it refers to the two seats of the dual monarchy, in Vienna and Budapest. I expand the methodology of Volume I for grounding discussion of states in the statistics they generate. Revenue and expenditure accounts are analyzed as in Volume I. Revenue clues us in to the state's relation with power actors in civil society, revealing the extent to which it was insulated from or embedded in civil society power networks. (These concepts are explained in Chapter 3.) Expenditure reveals state functions. It gives a fiscal index of overall state size and of the relative importance of its functions. I adjust these fiscal totals for inflation and population growth; and I relate them to gross national product (GNP) or national income, measuring the size of the country's economy.

In modern times we can add statistics on state empolyment. The number of officials also seems to measure the size of the state, and is also controllable for population growth. However, personnel figures will prove extremely unreliable — and will actually tell us more about bureaucratic competence than size. I discuss personnel data further in Chapter 13 to illuminate the employment status of officials, their functions, organizational networks, and social backgrounds — revealing their homogeneity as either elite or bureaucracy and as either insulated from or embedded in civil society. We can now call the figures "statistics" without anachronism, for the word and its cognates emerged just before 1800 in English and all European languages as meaning data pertaining to the state — revealing the state modernization now under way.

This volume will tell a paradoxical tale of the development of the modern state. On the one hand the nineteenth century saw the emergence of a state justifiably termed modern – no larger in relation to its civil society, but undertaking many more civil functions, quasi-representative, becoming more centralized, bureaucratic and meritocratic, its infrastructures able to penetrate efficiently all its territories. On the other hand, this modernization was not unitary but polymorphous, in each phase responding to diverse political crystallizations. This resulted in an infrastructurally powerful state that was in certain respects less coherent than its predecessors.

## The size of the state: expenditure trends

I first use expenditure trends as an indicator of overall state growth. Were states growing in the sense of spending ever larger sums of money?

Table 11.1 contains the available expenditure figures in current prices expressed in the national currencies of the mid-nineteenth century (several countries changed their currencies during the period). Figures for the central states of Austria, Britain, France, and Prussia-Germany are available virtually from the beginning, and figures for the U.S. federal government are available from 1790, immediately after its establishment. Austrian figures need to be watched carefully because they refer sometimes to the entire Habsburg lands and sometimes only to the western half (the Austrian Reichshalf, comprising just over 60 percent of the total population). Local-regional governments are less evently documented. Figures for British local authorities, French departments and communes, and German Länder and Gemeinde and estimates for American state and local governments are available from various points across the mid-nineteenth century. Some Austrian local figures become available toward the end of the century, but I confess to not fully understanding their structure and have omitted them.

Like all the figures presented in this chapter, expenditure figures are to be treated with some reserve. Later figures tend to be more reliable than earlier ones, and central government figures are more reliable than local-regional ones. Generally, I have followed the guidance of specialist historians as to the meaning and accuracy of the surviving accounts. I do not claim that these figures are entirely accurate; none could be. I do claim, however, that they are the most comprehensive data yet assembled for this period.

All central states grew massively in money terms. In 1760, the British central state spent 18 million pounds; in 1911, it spent almost 160 million pounds. This eightfold increase also occurred in France. The other states grew even more: Austria and Prussia-Germany grew about fortyfold (making allowances for the fact that, from 1870 on, Austrian figures in Table 11.1 relate only to the Austrian Reichshalf); and the United States rocketed more than two-hundredfold (from a tiny beginning).

Adding local-regional governments increases the growth, but problematically. In the earlier part of the period there was local-regional government, but neither we nor central governments of the time could know its scale or cost because it was effectively autonomous (a significant finding discussed later). That part of local-regional government known, and in some sense accountable, to the central state started

Table 11.1. Total expenditure of central states and all levels of government, 1760–1910, current prices

	Austria	Prussia- German	<b>y</b>	France		Great I	Britain	United	States
Year	Central (millions of florins)	Central (millions marks)	All s of	Central (million francs)	All s of	Central (millior pounds	is of	Central (millior dollars)	is of
1760	58	61		506		18.0			
1770		51		333		10.5			
1780	65	64		411+		22.6			
1790	113	90		633+		16.8	23.0	4.3	
1800	167	106		726		51.0	67.0	11.0	
1810	216			934		81.5	94.0	8.7	
1820	160	201		907		57.5	70.0	19.3	27.7
1830	138	219		1,095		53.7	65.0	17.0	33.1
1840	165	204	234	1,363		53.4	64.0	28.9	67.6
1850	269	252	334	1,473		55.5	66.0	44.8	89.2
1860	367	323	496	2,084		69.6	87.0	71.7	171.7
1870	332	1,380	2,360	2,482	3,348	67.1	92.0	328.5	611.7
1880	432	519	1,851	3,141	4,180	81.5	112.0	301.0	621.1
1890	560	1,044	2,690	3,154	4,289	90.6	123.0	378.9	854.1
1900	803	1,494	4,005	3,557	4,932	143.7	265.0	607.1	1,702.1
1910	1,451	2,673	6,529	3,878	5,614	156.9	258.0	977.0	3,234.0

Notes: All government = federal + state + local governments. For the United States in all tables, 1900 is actually 1902 and 1910 is 1913.

Sources

Austria: Net normal and extraordinary expenditures of the central government.

1760 Janetschek 1959: 188.

1780-1860 Czoernig 1861: 123-7 (in this and subsequent tables, 1780 is actually 1781 and 1860 is actually 1858). Figures refer to the entire Austrian Empire.

1870-1910 Wysocki 1975: 109; the Austrian *Reichshalf* (disbursing about 70% of the fiscal revenues of the Austro-Hungarian dual monarchy). Hungarian figures are not available.

In 1858, 100 old florins were revalued at 105 new florins. I have not adjusted the figures either in this or subsequent tables.

Prussia-Germany: The following adjacent years were used in this and subsequent tables: 1821, 1829, 1852, 1862, 1872, 1881, 1892.

1760-1860 Prussian central government figures and 1870-1910 all German government figures:
Riedel 1866: tables XV-XX; Leineweber 1988: 311-21; and Weitzel 1967: table 1a.
Note that Andic and Veverka 1963-4 give somewhat higher figures for local government than do Leineweber and Weitzel.

1870-1910 German central government figures: Andic and Veverka 1963-4. France

1760-70 Riley 1986: 56-7, 138-48, for the years 1761 and 1765.

1780-90 Morineau 1980: 315 - ordinary expenditures only for years 1775 and 1788, thus being a slight understatement of total expenses (because there was no war in either year).

1800-10 Marion 1927: IV, 112-3, 325; years are 1799-1800 (*L'an* VII of the Revolution) and 1811.

1820 Block 1875: I, 495-512.

1830-60 Annuaire statistique de la France 1913, "Résumé rétrospectif," 134.

1870-1910 Delorme and André 1983: 722; 1870, 1900, and 1910 are actually 1872, 1902, and 1909. *Great Britain* 

1760-1910 Central government: Mitchell and Deane 1980: public finance tables; up to 1800 net expenditure, thereafter gross expenditure.

(Sources continue on next page.)

Table 11.1. (cont.)

1790-1910	All government: Veverka 1963: 114, for the United Kingdom, including Ireland. As Veverka gives no references I have been unable to check his source material. His population figures are not accurate. 1800 figure is actually 1801 in all tables.
United State	S 1000 and 1010, H.S.
1790-1910	Central (federal) government, 1790–1910, and all government, 1900 and 1910. U.S. Bureau of the Census 1975: tables Y350–6. As this standard source contains only postal profits. I have deducted these and added total postal expenditures from U.S.
	Department of the Treasury 1947: 419-22.
1820-90	State government, 1820–90: calculated from data in Holt 1977. Holt's incomplete data for states were converted to per capita figures and then aggregated up to the total U.S.
	population.
1820-90	population.  Local government, 1820–90: calculated from Legler et al. 1988: table 4, and Legler et al. 1990: table 3. Note that (a) these are total revenue, not expenditure, figures, and (b) I have estimated the figures for 1820–40, assuming that per capita revenues for all local governments were 8% of the per capita figure for cities in 1820, 9% in 1830, and 10% in 1840 (the proportion was known to be 12% in 1850, 16% in 1860, 21% in 1870, and then continuing to slowly ascend). These figures thus can only be rough approximations.

small and then in the later part of the period usually grew faster than central government. It is unlikely that local-regional government costs declined in the earlier part of the period, so the cost of all government (central plus local-regional) must have escalated even more than Table 11.1 suggests.

Figures like these provide the main evidence for the onward-andupward stories. They are not, however, very meaningful. We must control for inflation, which eroded the values of all currencies over this period, and we must control for population increase, rapid everywhere, though greatest in Prussia-Germany and the United States because of territorial expansion or massive immigration. If populations were growing faster than expenditures, then the real ability of states to penetrate their subjects' lives may have actually declined. I control for both inflation and population growth in Table 11.2, expressing expenditures as a percentage of their 1911 per capita level at constant prices.

These two controls eliminate much state growth, though to differing degrees according to country and level of government. In real per capita terms local-regional government grew more and later than central government except in France, where there was no significant difference between their growth rates. Growth was substantial and steady in France and Austria. Britain and Prussia experienced virtually no central government growth over the period and a pronounced decline after midcentury; but their local-regional governments grew substantially and steadily. There were two American trends, a mild secular trend upward, exaggerated by the rocketing effect of the Civil War on the

Table 11.2. Trends in per capita state expenditure at constant prices, 1780-1910, central state and all government (1910 = 100)

	France		Great B	ritain	United States		Prussia- German	y	Austria
Year	Central	All	Central	All	Central	All	Central	All	Central
1780			70						
1790			45	32	12		63		
1800			74	51	14		86		21
1810			96	61	9				19
1820	27		77	50	18	8	94		19
1830	31		76	48	14	8	80		14
1840	35		68	42	16	13	68	32	19
1850	43		87	53	22	14	82	46	25
1860	50		86	57	23	18	69	44	25
1870	67	63	69	50	57	35	118	83	35
1880	85	81	71	67	56	37	32	48	41
1890	92	89	75	63	68	51	63	66	54
1900	99	96	103	118	91	80	78	86	72
1910	100	100	100	100	100	100	100	100	100

Sources: Expenditure sources and notes as in Table 11.1. The following are sources for constant prices:

France: Lévy-Leboyer 1975: 64. Prices set to 1908–12.

Prussia/Germany: 1790-1860, Prussia; 1870-1910, Germany. 1790 is actually 1786; 1800 is calculated with 1804 prices. 1820 is actually 1821.

1790–1800 Weitzel 1967: table 1a.

1820-1910 Fischer et al. 1982: 155-7. Prices set to 1913.

Great Britain: 1780-1840, Lindert and Williamson 1983: 41 - their "southern urban, best guess" price index - spliced with 1850-1910, Deane 1968. These two indexes differ slightly during their overlap period of 1830-50.

United States: U.S. Bureau of the Census 1975: tables E52-89. Warren, Pearson wholesale price index for 1790-1890 spliced with Bureau of Labor Statistics Index for

Austria: Mühlpeck et al. 1979: 676-9. Prices set to 1914.

figures. I explain these various trends later. For the moment I note that state growth was indeed real though it was variable. Over the century states did become bigger, though not spectacularly so, as measured by their expenditures, and local-regional state growth became greater than central state growth.

But I add a third control. The period saw massive economic growth, containing both the first and the second industrial revolutions, which actually centered in the five countries under discussion. Thus their economies might have been growing faster than their states, in which case the economic significance of the state might have actually declined.

Government expenditure as percentage of national income or national product, 1760–1910 Table 11.3.

	Prussia-Germany NI	any	Grea	Great Britain NI	ij.		Great Britain GNP	tain	Austria GNP	United States GNP	ates	France GNP		France CO
Year	Central	Ail	Central	ral	All		Central	All	Central	Central	All	Central	All	Central
			B	٩	 	ъ.								
				8								12		16
1760	35			77								<u></u>		6
1770	23			11					17			<b>∞</b>		
1780	22			77 ?		16			77	23		12		13
1790	24			77	•	10			ì	; ;		٥		12
1800	23		19	27	53	္ဌ (				 		10		1 7
1810			21	37	31	43					,	21		14
1820	10		20	23	75	28			,	6.7	† c	- 1		12
1830	17		16	19	19	23	12	15	6	1.8	3.5 0.5	~ 0		17 C
1070	12	14	12		14		11	13	6	1.7	0.4	<b>x</b>		77
1040	77 0	1 2	1 5		7		10	12	11	1.7	3.4	6		51
0001	Σ (	7 5	7 5		12		0	10	1	1.9	4.5	6		13
1860	×	77	<b>-</b> 1		3 5		, ,	2	11	4.5	30	10	13	14
1870	15	18	_		3;		۰ د	V C	11	0.0	0	13	16	18
1880	4	13	∞		Π		١٥	ν (	7 ;	V. C	, v	£ 1	2 2	19
1890	v	13	_		10		7	ý	L3	6.7		<u> </u>	7 7	10
1000	v	14	6		16		∞	14	15	2.8	6./	77	10	77
1010	, <b>v</b>	1,	١				7	12	17	2.5	8.7	11	$\Gamma$	CI
1910	>	27												
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Notes: In the late eighteenth and the nineteenth centuries, gross national product exceeded national income by about 15% and commodity output by 25%.

NI = national income; GNP = gross national product; CO = commodity output.

Gross national product, national income, and commodity output Sources: Expenditure sources and notes as in Table 11.1

Prussia-Germany

1760–1800 Weitzel, 1967: table 1a, using the extrapolations he suggests for missing years. 1820–1910 Leineweber 1988: 311–21 – national income at factor costs. United States: All years: Mitchell 1983: 886–9 (GNP).

National income: Dickson 1987: I, 136–7 – estimating national income in 1780 at 357 million florins (the midpoint of his estimate range) and in 1790 at 410 million florins. I have not used Dickson's own percentage estimates. They concern ordinary peacetime revenues, which were lower than actual expenditures.

GDP for Austrian Reichshaff: Kausel 1979: 692. I have calculated 70% of Czoernig's expenditure for 1830–60. After the 1867 division of the empire, Austria contributed 70% of the joint budget and Hungary 30% (in 1908, the Hungarian contribution was increased to 36.4%, but I have not adjusted my 1910 figure). 1780 - 90

1830 - 1910

Great Britain: National income estimates: (a) Deane and Cole 1962: 100; (b) Claus 1703 – Canary Commerce. Cole 1968: 104–5.

GNP: Deane 1968: 104–5.

France: GNP 1760–90: Goldstone 1991: 202. GNP 1800–10 (actually calculated from figures for 1781–90 and 1803–12): Markovitch 1965: 192.

Expenditure for 1788 from Morineau 1980: 315; for 1820–1910 from Lévy-Leboyer 1975: 64. Commodity output = market value of agricultural and industrial products (i.e., excluding services). 1740–67: Riley 1986: 146 (1770 figure actually 1765). 1790–1910: Marczewski 1965: LXX.

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Table 11.3 investigates this possibility by expressing state expenditures as a percentage of the national economy – of national income, gross national product (GNP), or total commodity production.

Here I sound a warning: Estimates of the size of national economies are even less accurate than expenditure figures. Economists do not agree about the best measures and they work with sometimes rudimentary sources differing between countries. Their figures aggregate the production, sales, or income figures of particular industries, areas, or occupations up to whole economic sectors. In this period it is particularly difficult to estimate the output of the service sector. Some economic historians confront these difficulties by estimating on the production side (GNP), others on the income side (national income), and still others omit services altogether (commodity output). Thus, unless the differences are large, country comparisons are hazardous. I am also wary of comparing different sets of estimates over time, as they are often based on use of different methods. Hence these figures cannot be used for subtle purposes. Luckily the overall trend is clearcut.

The trend is striking and surprising. Contrary – I am fairly confident – to most readers' expectations, state activities *decreased* as a proportion of national economic activity between the mid-eighteenth and the early twentieth century. The data are not complete or unanimous, but most point in the same direction.

The British figures are the fullest. They jump around in the eighteenth century between high and average levels, rise to a peak at the beginning of the nineteenth century, and then decline fairly steadily. I am, however, somewhat skeptical about the most extreme set of British figures in Table 11.3, column b, derived from Crafts's (1983) estimate of national income during the Industrial Revolution. His downward adjustment of Deane and Cole's (1962) estimates would result in all government expenditures for 1811 (for which we have accurate figures) amounting to 43 percent of national income. Although 1811 was a year of major warfare, I doubt that any government before the twentieth century had the infrastructural power necessary to expropriate this proportion of national income. Even in World War I the British government's wholesale mobilization of the economy, plus proportionately larger armed forces, expropriated only 52 percent. At some point economic historians' addiction to numbers must give way before sociological plausibility. Nonetheless, whatever the exact proportion of British government activity, it declined substantially throughout the long nineteenth century.

The trend is even more marked for Prussia-Germany. Its early central government alone spent a substantially higher percentage of

GNP than all levels of government did in later Imperial Germany. The highest Austrian figure is also early, in 1790 (though the 1800 and 1810 figures, if available, would undoubtedly be higher). There is no overall French trend, although I argue later that available figures understate state activity during the the Revolutionary and Napoleonic wars. There was virtually no growth of the U.S. federal state, apart from the impact of the Civil War on 1870 figures. But what is striking about the United States is the one comparative difference big enough to be reliable: the small scale of American government at each level compared to European states. As conventional wisdom suggests, the United States really did have far less government than Europe – as we might expect from the capitalist-liberal regime identified in Chapter 5.

It is probable that late eighteenth-century states had the highest fiscal extraction rates the world had seen before the wars of the twentieth century. Obviously, we cannot make good estimates of GNP in earlier periods, but most guesses put European state expenditures before the seventeenth century well below 5 percent of national product or income (Bean 1973: 212; Goldsmith 1987: 189). The first calculation we can hazard is for 1688, when Gregory King estimated GNP in England and Wales. His figures have been revised by Lindert and Williamson (1982: 393). I gross up their estimate to Britain as a whole and then divide by average state expenditures during 1688–92 (the first years for which good expenditure data are available; see Mitchell and Deane 1980: 390). This yields an estimate that the British state extracted 5.5 percent of GNP. Rasler and Thompson (1985) may have done a similar calculation, though, unfortunately, they give no details of their methods. They estimate expenditures at 5 percent of GNP in 1700.

King also estimated Dutch GNP and revenue for 1695, but his GNP is considered too low and his revenue too high. He put government revenues at 25 percent of GNP (Goldsmith 1987: 226 accepts this at face value), but this is far too high. Grossing up per capita revenue figures for the province of Holland (Riley 1980: 275), and being agnostic about both schools of thought concerning Dutch GNP, yields a revenue estimate of 8 percent to 15 percent of GNP. I am more impressed by those of the high-GNP school (Maddison 1983; de Vries 1984) than by those staying closer to King (e.g., Riley 1984). I finally plump for about 10 percent - in a country considered to be very highly taxed. Seventeenth-century states may, therefore, have spent 5 percent to 10 percent of GNP, and this probably remained true in the early eighteenth century. Rasler and Thompson estimate British expenditure at 9 percent of GNP in 1720, though again with no explanation of methods. We can put French expenditure in 1726 at about 6.5 percent of GNP (expenditure in Morineau 1980: 315; GNP following Goldstone

1991: 202). Thereafter it rose: Riley (1986: 146) estimates peacetime years during 1744-65 at 8 percent to 10 percent and wartime years at 13 percent to 17 percent.

Thus the upward eighteenth-century trend revealed in the tables had begun earlier. The conclusion seems as clear as imperfect data sources allow. As measured by finances, states rapidly expanded throughout the eighteenth century, before 1815 playing their greatest role in societies until World War I; then in the nineteenth century they declined. The first great sea change in the life of the state - in its size occurred in the eighteenth century. As Volume III will show, the next phase of growth in state size occurred in the mid-twentieth century, having begun during World War I. Thus Weber's fear of the "overtowering" state did not reflect reality through his own lifetime. Either he was responding to World War I or he was being remarkably prescient (he died in 1920). Similarly, those onward-and-upward stories of a state growing bigger and bigger, more and more looming over their societies during the period of industrial capitalism are wrong. Although the absolute financial size of states was growing at current prices and most were also growing modestly in per capita real terms, state fiscal size relative to civil society was now either static or declining.

This is such an important and counterintuitive finding that it might seem necessary to spend some time further evaluating data sources and methods to check the reliability and validity of the data, but I shall not do that. The downward trend is almost certainly real because it is easily interpretable and because it fits well with other trends. What we shall see are two contrary nineteenth-century trends that usually did not quite cancel each other out: A large increase in state civilian functions was more than counterbalanced in most countries by a larger decrease in its militarism.

Why did the state's traditional, military crystallization decline, after having rocketed upward in the eighteenth century? Three reasons explain the overall downward trend and the exceptions in Table 11.3. First, state expenditure varied, as it had done for millennia, according to whether the country was at peace or war, always rocketing with the onset of war. This is only partly revealed by Table 11.3, which somewhat obscures the role of war in Austrian and U.S. government finances. In Austria, the highest expenditure figure was in 1790, occasioned by the need to fight revolts in Flanders and Hungary. But the next two decades, fighting against Napoleon, would reveal even higher figures were GNP estimates available. The United States was at peace during all the years listed in the table. If we added expenditures for the Civil War period, then we should find the usual rocketing effect. In 1860, according to Table 11.1, U.S. federal expenditures were \$72 million.

By 1864-5, those of the two warring factions had leaped thirtyfold, to \$1.8 billion - the Union's to \$1.3 billion in 1865, of which military expenses contributed 90 percent (U.S. Bureau of the Census 1961: 71), and the Confederacy's to just under \$500 million in 1864 (Todd 1954: 115, 153). This total far exceeded federal expenses in every succeeding vear (despite vastly growing national population and wealth) until 1917, during World War I. It then absorbed 28 percent of GNP. As Table 11.3 reveals, this was about average for states caught in major wars. Peace normally made the American state puny; wars suddenly conjured up giants.

Table 11.3 also shows the impact of war on the other states. For Prussia-Germany the highest expenditure, in 1760, involved the Seven Years' War, and the rise of 1870 was for the Franco-Prussian War, which gave the highest per capita real expenditure found in Table 11.2. For Britain the eighteenth-century peaks of 1760 and 1780 involved the Seven Years' War and the American Revolution, whereas the enormous figures for 1800 and 1811 indicate the massive burden of the Napoleonic Wars. For France the early peak figure is 1760, the Seven Years' War, but the costs of the Revolution and the Napoleonic Wars are not reflected in the figures of 1800 and 1811 because France was subsidized by its occupied countries. Between 1740 and 1815, most states were fighting major wars for two-thirds of the time, involving progressively greater demands on manpower, taxation, and agricultural and industrial production. Their states became militarized. To say this of Prussia is to be entirely conventional, and Brewer (1989) has emphatically said it of constitutional Britain; but it needs saying of all late eighteenth-century states. States began the modernization process as little more than elaborated networks of drill sergeants, recruiting officers, impressment gangs, and attendant tax officials.

The nineteenth century did not end such state activities. Immediately after my present period ends, World War I had the normal effects. By 1918, total British government expenditures had rocketed to 52 percent of GNP, and military and war-debt costs contributed more than 90 percent of expenditures (Peacock and Wiseman 1961: 153, 164, 186). It is not easy to calculate French GNP during the war, but military and war debt costs also contributed 90 percent of a vastly inflated state budget (Annuaire Statistique de la France 1932, 490-1.) Similar increases occurred in Germany and probably Austria (whose figures survive only for the first full year of war; see Osterreiches Statistisches Handbuch 1918: 313). Only the United States escaped lightly during World War I, its central government share of GNP trebling, but only from 2 percent to 6 percent between 1914 and 1919.

This points directly to the principal cause of the relative decline of

the nineteenth-century state: The frequency and duration of European wars was high in the eighteenth century and then diminished between 1815 and 1914. Nothing in Europe then paralleled the impact of the French Revolution and the Napoleonic Wars. Nothing even paralleled the mid-eighteenth-century struggles - the War of the Austrian Succession and the Seven Years' War. The Austro-Prussian and Franco-Prussian wars involved large armies but only for short periods. The Crimean War did not severely stretch France or Britain; nor did their perennial campaigns in their empires (though all impacted on state expenditures for the relevant years). Only the United States fought a (civil) war comparable to earlier ones. This largely explains why expenses declined in Austria, Britain, and Prussia-Germany and increased in the United States.

The second cause of the trends indicated in Table 11.3 was that developments in military tactics, organization, and technology lessened peacetime army costs in the nineteenth century. Bonaparte's success in throwing relatively untrained masses with guns at the enemy meant that soldiers' skills had declined. Fewer professional soldiers were required. The peacetime standing army consisted of a cadre of permanent professionals plus rotating cohorts of young conscripts and recalled reservists. This could be expanded rapidly at the onset of war. In the mid-eighteenth century, Prussian, Austrian, and French armies had doubled after a few months of war; in the Napoleonic Wars and the Austro-Prussian and Franco-Prussian wars, they rose four- to fivefold. In World War I, this trend continued, to an eightfold increase after two years of war. These army developments did not apply to navies, which remained professional. Thus Britain, predominantly a naval power, got fewer peacetime savings. I explore the changing nature of state militarism in Chapter 12.

The third cause of the trends revealed in Table 11.3 was traditional. The effect of war on state expenditures continued into peacetime, as it had done for most of the previous millennium. States borrow heavily in wartime, and when war ends, they have to repay the debt. After the Napoleonic Wars direct British military expenditures were tailing off, but debt repayment of war loans absorbed a high proportion of the budget for another fifty years. As Table 11.3 shows, British government expenditure in relation to national income and GNP declined slowly, not bottoming out until 1870. If wars are frequent, as they were in most of Europe between 1740 and 1815, or as in nineteenth-century Austria, the bottoming out occurred only in time for the next war. Only the nineteenth century allowed full bottoming out for most states.

Combined, these three military reasons explain the main discernible trends in Table 11.3. In fact their explanatory power raises the question

Table 11.4. Percentages of all government budgets allocated for civil and military expenditures, 1760–1910

	All	Civilian							99	99	27	75	62	81	& i	52	4 6
tates		Military	,		!	19		49		65	65	49	9 ;	35	41	<u>ئ</u> د	<b>2</b> %
United States	Central	Civilian			· ·	9 5	77	16	95	<del>2</del> 2	<del>5</del> 5	42	49	47 6	54	ئ 4 و	8 8 8
	All	Civilian			ć	ድ አ	20	;	7.	31 21	31 35	55	41	2 5	10	39	3 %
itain		Military	75	39	3 8	31 21	7.0	n 6	₹3.6	97	07	17	3 5	7 S	55	900	6 <del>1</del>
Great Britair	Central	Civilian	9	S ,	, <u>c</u>	CT '	1 ر	11	18	01	13	77	, c	9 <del>2</del>	37	36	8 4
	All	Civilian											70	£ 5	t &	5 2	56
		Military	50	33	22	) Z	. X	5 6	3 ⊱	34	35	30	36	2 F	34	. X	37
France	Central	Civilian	14	24	2.5	24	; 0	48	47	49	20	12	32	3 6	32	36	40
	All	Civilian											35	63	55	4	. 29
ermany		Military	98 8	8 8	75	74		38	34	35	37	36	40	83	78	59	52
Prussia-Germany	Central	Civilian	6	<b>√</b> ∞	25	22		45	20	53	48	49	22	15	25	35	40
		Military		51	62	61	57	35	33	33	47	51	24	19	19	17	16
Austria	Central	Civilian		28	21	14	15	33	35	35	34	39	46	45	39	47	9
		Year	1760	1780	1790	1800	1810	1820	1830	1840	1850	1860	1870	1880	1890	1900	1910

military expenditures + debt charges (not listed here) = 100%

1380–1860 Czoernig 1861: 123–7.
1870–1910 Wysocki 1975: 109–13; Wagner 1987: 300, 590–1; Mischler and Ulbrich 1905: II, 95 (Austrian Reichshalf only). This has sometimes involved recalculating source figures. All 1870 and 1910 figures and total expenditures from Wysocki; military expenditures from Wagner, recalculated to exclude the Hungarian military contribution to the joint army and to the Honved reserve force. Debt figures 1880–1900 from Mischler and Ulbrich. Civil expenditures = the residual. Hence Austrian figures must be treated with some caution.

nany: 1820-70 = Prussia; 1880-1910 = Germany. Riedel 1866: tables XV, XVI, XVIII, XX. Andic and Veverka 1963-4: 262; Leineweber 1988: 312-6. I adjusted his 1820-70 figures to eliminate "civil debt costs" from civil expenditures (to make the German figures comparable with those of other countries). Riley 1986: 56–7, 138–48 (the year is 1761).

Morineau 1980: 315, ordinary expenditures only (probably overstating civil expenditures by about 30%) for years 1775 and 1788.

Marineau 1980: 315, ordinary expenditures only (probably overstating civil expenses by about 30%) for years 1775 and 1803, which all allocate Marineau 1927: 1V, 234, 238, 241–2, 325, 1928: V, 14, 19; Block 1875: I, 495–512. 1800 average budgets for 1801, 1802, and 1803, which all allocate are available and is only approximate. France 1760 1780–90 1800–20

4870–60

Annuaire statistique de la France 1913; Block 1875: I, 491–3.

1870–1910

Delorme and André 1983: 722, 727.

Great Britain: Central government sources as for Table 11.1. Mitchell and Deane give only the "principal constituent items" of the budget. I have assumed that residual miscellaneous items are all civil. In 1860, these items amount to 12% of the total budget; in all other years, to much less. Local government, 1790 U.K. figure residual miscellaneous items are all civil. In 1860, these items amount to 12% of the total budget; in all other years, to much less. Local government from Mitchell and Deane 1980: public finance tables. Full data available from 1880 (actually 1884). Estimating from Veverka 1963: 119; other local government from Mitchell and Wales plus county receipts England and Wales plus 12.5% additional Scottish expenditure. Note that Veverka 1963: 119 estimates U.K. expenses at 34% for 1840 and 47% for 1890.

United States: Sources as for Table 11.1. Payments to veterans counted as military expenditures. I assume no military expenses by local governments (state governments funded the national guard).

of why state expenditure did not decline more dramatically. The answer is that states were increasingly spending on other, civilian roles (cf. Grew 1984). Table 11.4 details the proportion of central-government expenses for civil and military functions and of all government (central plus local-regional) expenses for civil functions (local-regional government incurred few military costs). The residual, not given in the table, is debt repayment expenses. Indebtedness somewhat blurs the distinction between military and civil expenses because during the nineteenth century borrowing shifted from financing of wars to paying for large public capital projects such as railways and schools. In the case of Germany, the statistical sources give the exact purpose of each debt and we can correct for this understatement. Even without this correction, however, the table reveals a clear secular trend.

All the columns reveal that civil expenses increased relatively through the period. By 1911, between 60 percent and 80 percent of all government expenses was for civil functions. Adding civil debt increases the German figure from 67 percent to 75 percent (Leineweber 1988: 312-6), so the true range for total civilian expenditures among all the states is about 70 percent to 85 percent. For the beginning of the period, we cannot produce a clear-cut figure, because of the lack of local-regional government data. But the trends in the data that are available lead me to guess that the range in the mid-eighteenth century was only slightly higher than the central state figures given in the table - that is, they would be in the range of 15 percent to 35 percent. This percentage increase in civilian expenses - from about 25 percent in the 1760s to about 75 percent in the 1900s - indicates a second sea change in the scope of the modern state, this one without parallel in history. This growth was quite steady from the mid-nineteenth century on. It was not greatly affected by the economic cycle: the great agricultural depression from 1873 had no great impact (as Higgs's crisis theory might suggest). Nor, as we shall see, were most rising expenditures those normally associated with response to crisis, such as welfare spending.

Apart from Austria, most civil growth was at local-regional government levels. A division of labor devolved: Most of the new civil functions devolved to local or regional governments, with the central state retaining its historic militarism. Smaller central states remained most military. The extreme case is the post-Civil War United States, whose small federal state was predominantly military even in 1910. The moderate-sized central states, the British, French, and German, were fairly equally split between civil and military functions. In the Austrian lands, as we saw in Chapter 10, the failure to reach a constitutional settlement with the provinces meant that the central

Habsburg government retained most of its powers and most of the new civil funtions (after 1867, shared with the Hungarian central government in Budapest).

The division of functions between central and local varied among countries. American federal government spent less than local and state governments from the first point for which good figures are available. In the German Reich, local-regional quickly overtook central government, but this had a distinctive significance. The largest of the regional Länder, Prussia itself, spent more money than the central Reich government, yet was in a sense also the "German" state. In both countries the disparity was not reversed until involvement in World War II. Austrian, British, and French central exceeded regional-local expenditure for the whole period. Coordination also differed. In the centralized countries Britain and France, all levels of government began to coordinate their activities in the late nineteenth century and local-regional accounts were submitted to the national government. In part-federal Germany, coordination and accounting lagged a little. In confederal Austria, it was more particularistic, varying by province and Reichshalf. In the United States, the federal government had little contact with state or local government and knew nothing of their accounts for the whole of this period. Coordination would have been regarded as an infringement of liberties and disallowed by the Supreme Court. States varied substantially ir what I term their "national" crystallization - how centralized or confederal they were.

These variations make similarities in overall trends all the more remarkable. As Grew (1984) has observed, the broadening of scope was occurring across European states of very different constitutions and levels of economic development. The nineteenth century introduced major nonmilitary government expenditures. In contrast to previous centuries, civil expenditures increased through periods of peace instead of being, as in the past, a by-product of war. In 1846, the civil expenditure of the British central state was more or less what it had been in 1820 and in every intervening year. But from 1847 on, a steady increase occurred in almost every year, war or peace. The pattern is confirmed in all available national statistics. War was no longer the only ratchet of state growth.

We can establish symbolic dates for the transition in the central state: the point at which civil outran military expenses for the first time, controlling for the effects of debt repayment. In the accounts this occurred as early as in 1820 in Prussia, although this is misleading, as the army was used in mainstream administration and was partly financed from there. But Britain reached this position in reality in 1881 – probably the first time in the entire history of organized states that

the greatest Power of an era devoted more of its central state finances to peaceful than warlike activity. The central state remained a warmaking machine, but it was now also at least half civil. We may begin the journey to a polymorphous model of the modern state (as promised in Chapter 3) by labeling this half-military, half-civil state a "diamorphous state." As such it was novel in the world history of major successful states. We did not see such a state in Volume I. In the late nineteenth and early twentieth centuries such a state was not merely an isolate risking its survival by running down its military as a Saxony or a Poland had earlier. All the major Powers did this. So did such minor Powers as Belgium, Norway, and Sweden (Annuaire Statistique de la Belgique 1895; Woytinsky and Woytinsky 1955; Norges Offisielle Statistikk 1969: table 234; Therborn 1978: 114-6).

The similarity is striking. Minor Powers were slightly less militaristic than major ones, whereas U.S. total government was somewhat less militaristic and its central government much more militaristic than among the European Great Powers. But these are the only significant differences. There is little support here or in the personnel statistics given later for the frequently expressed notion that the Austrian, German, and French states were somehow uniquely oversized. I quoted Marx earlier on France, Kennedy (1988: 217) argues thus on nineteenth-century Austria, and Bruford (1965: 98–9) and Blanning (1974: 11–15) argue thus on German states of the eighteenth century. Neither fiscal nor personnel data deal kindly with such stereotypes.

I also qualify Davis and Huttenback's (1986) contention, repeated by O'Brien (1988), that in the late nineteenth century, British imperial military commitments were peculiarly draining. Per capita British expenses were the highest, but so were its civil state expenses. Britain was the richest European country and could afford both, as Kennedy (1989) also observes. As a proportion of GNP, neither British civil nor military expenses differed significantly from those of other European Great Powers. By 1910, military expenses as proportions of GNP ranged from 4.1 percent in France, about 2.9 percent in Germany, 2.8 percent in Britain, to 2.7 percent in Austria, with the United States trailing at 1.2 percent. France (like Russia) was straining its economic resources to maintain its major-power status, whereas hemispheric isolation eased the pressure on America. These are the only deviations from a major-power norm.

These figures are not dissimilar to Hobson's (1991) calculations of military expenditures as a percentage of national income: France 4.0 percent, Germany 3.3 percent, Britain 3.0 percent, the U.S. 1.1 percent, and with Russia in the range of 3.5 percent of 3.8 percent.

We have seen two great sea changes in the life of the modern state. A massive militarist state had arrived in the eighteenth century, metamorphosing into a diamorphous civil-military state over the late nineteenth. Eighteenth-century states had been the first to thoroughly penetrate their territories - with networks of recruiting officers and tax assessors and collectors. Although these remained, they were no longer simply the "state" but, rather, shared state institutions with a host of civilian officials.

#### The scope of the state

The shift of expenditures (and also of personnel) from military to civil activities looks uncommonly like a widening state scope (as Grew 1984 emphasizes). Which civil functions were growing? The data are not easily comparable at this level of detail. I can be semi-systematic only for the period 1870-1911. Fortunately this is when almost all civil growth occurred.

The traditional war-dominated state had also fulfilled three main civil functions. (Chapter 4 shows that it also generated much particularistic local legislation.) Its heart had been the household and court of the monarch; its sinews, the fiscal apparatus necessary to support its military activities; and its head, the administration of law and order. In the mid-eighteenth century, these three disbursed more than 75 percent of the small civil expenditures of the Austrian, French, and British states. (We lack a Prussian breakdown, and the United States did not yet exist.) Yet Table 11.5 shows that these had declined by 1910 to between 5 percent and 20 percent of civil expenses, a remarkable change. After 1870, they increased in money terms (though not in France) but not in real or relative terms. There may actually have been fewer revenue collectors in 1911 than in 1760; royal households and courts were also smaller - and abolished in the United States and France; and though civil police forces were now increasing substantially, legal officials were not.

Table 11.5 shows that these traditional state functions had been overtaken everywhere by two principal growth areas, education and transport, followed by two lesser ones, postal and telegraph services and "other economic services" - principally environmental activities and agricultural and industrial subsidies. This was remarkably similar in all countries, although the division of functions between central and local-regional government differed considerably.

British increased central expenses were principally adjuncts to the growth of discursive literacy - education, post office, and telegraph. By 1901, these contributed 70 percent of total civil expenditure.

Percentage increase in civil expenditure items, 1870–1910, and their percentage contribution to total state budget in 1910 Table 11.5.

	Austria	ria rol	France	, se	Germany	Miy Vi	Great Britain	ritain	United States	United States
				[a]	All Gov	All Government	All Government	ernment	All Government	State Government
	Inc.	Inc. Cont. Inc. Cont. Inc.	Inc.	Cont.	Inc.	Cont. Inc.	Inc.	Cont. Cont.	Cont.	Inc.
Administration/Law and order	11	9	(33) 14	14	42	21	21	9	111	183
Education	<i>L</i> 9	3	429	6	248	19	531	19	<u>×</u>	400
Other welfare			20	æ	151	10	152	œ	ر د	437
Transport	398	50	34	6	68	11	338	2.	17	238
Other economic	14	2)		_			385	1 7	13	270
services			83	7	188	2	) }		Ŷ.	
Postal and telegraph	74	6		_	)	1	259	∝	×	
Other		14		7		4	ì	00	∞ ∞	

Austria: We also Table 11.1.

Austria: Wysocki 1975: 230–41. Figures for the Austrian Reichshalf. The large "other" category derives from the incomplete nature of Austria: Wysocki 1975: 230–41. Figures for the Austrian Reichshalf. The large "other" category derives from the incomplete nature of Wysocki's presentation. I suspect that most "other expenses" were disbursed by the Ministry of Finance to various other departments. Great Britain: Period covered is 1880–1910: Figures only available for period from 1880 (for some items 1884) to 1910 and for U.K. central government for England and Wales. Hence those figures will slightly overstate percentage contribution of items primarily provided by central government (i.e., postal services). They also understate administrative costs, as those are not given separately for local government.

United States: Contribution to 1913 federal, state, and local government expenses from U.S. 1976: table Y533–66. Only the increase during the period 1870–1900 at state government level is available – calculated from Holt 1977.

Local-regional expenditure was led by both symbolic and material communications, education and highways. In French budgets, education, postal and telegraph services, and roads, bridges, and docks also predominated; in American budgets, education, highways, and postal services led, only the postal service being a federal responsibility. Among the individual American states by far the biggest expansion was in education (Holt 1977).

In Germany, education was again the largest area of growth, followed by state subsidization and ownership of various enterprises, including railways. Here railways played a distinctive role in the largest government in the country, the Prussian regional government, absorbing just under half its total expenditure (and rather more of its revenue, as we see later). Railways absorbed the largest part of the Austrian civil budget, backed (as in Germany) by expenditure on other state and private enterprises. A similar pattern emerges among minor Powers: In Norway and Belgium, railways and other state-directed enterprises and education led. Remember these are gross expenditures; nationalized industries also brought in revenue, often profits. I consider this later.

These budgets reveal three forms of growth: the first universal, the other two more variable – more variable than Grew (1984) acknowledges:

- 1. The principal growth everywhere was in what I term infrastructural state functions (as does Wysocki 1975 commenting on Austrian growth). The infrastructures enabled states to extend material and symbolic communications throughout their territories. In fiscal terms this was easily the biggest, most universal extension of state function during the period.
- 2. Yet states varied significantly in the extent to which they nationalized material infrastructures and resources, especially railways. Britain, the United States, and France did not, though they regulated and often subsidized them; France owned the track, though not the rolling stock; other states ran railways and some ran many other enterprises too.
- 3. Table 11.5 also picks up the variable beginnings of the welfare state, especially in Germany. Local government had long provided poor relief (whose overall level is generally obscured by inadequate surviving records). Some central governments had long provided welfare for military veterans (whose level is obscured by my presentation of the data). Now central states were starting to provide the first rights of social citizenship.

Chapter 14 analyzes and explains these three increases in civilian scope. But let me here make a preliminary point: At least compared to

the historic civil functions of the state, they might be quite popular, consensual extensions of scope, at least among most actors enjoying political power in this period. Of the old state functions, armies and law and order had contained considerable domestic militarism; armies and navies were also used abroad for the private glory of the ruler and old regimes; and court spending was for their private consumption. But new infrastructural spending could be plausibly claimed as useful for economic and military development alike; while welfare spending might supposedly contribute to the well-being of the people as a whole. The greater scope of the modern state might be more consensual than the lesser scope of the traditional state. I discuss this argument in Chapter 14. But of course, consensus would depend on how it was paid for.

#### Revenue and representation

Government revenues have already figured prominently in my narrative of political struggles, as they did in Volume I.<sup>2</sup> Attempts to increase or rationalize revenues caused revolution in France and America, national revolts in Austria, and reform in Britain; while Prussian ability to make do with traditional revenues enabled it to minimize both reform and revolution. At the end of the eighteenth century and the beginning of the nineteenth, politics was fiscal struggles, as it had been for centuries.

This intense fiscal-political relation weakened considerably during the nineteenth century. As we have just seen, a largely peaceful century plus the expansion of the capitalist economy reduced the fiscal strain. States needed proportionately less revenue than they had earlier (as Webber and Wildavsky 1986: 207 also note). Extracting it usually brought mutters, not howls, of principled protest (except in troubled Austria). Because the pain eased, something occurred that would have surprised earlier revolutionaries and reactionaries alike. Party democracies proved more amenable to this lower level of revenue extraction than monarchies. Parliaments could scrutinize accounts constitutionally presented to them, agree that certain moneys were required, debate alternatives, and vote the revenue. Representation made moderate revenue extraction more consensual. Monarchs

<sup>&</sup>lt;sup>2</sup> The best general history of state revenues is given by Webber and Wildavsky (1986). Their chapters 6 and 7 discuss this period. See also Ardant (1975) and Woytinsky and Woytinsky (1955: 713–33). However, all their revenue figures are less comprehensive and reliable than those given here. Hobson (1991) gives the best comparative analysis of revenue for the period 1870–1914.

Table 11.6. Percentage of state revenue coming from direct and indirect taxation and state property, 1760–1910

	0	S.F.				26	21	37	2,5	18	17	i	56		
Juited States	-	Ig				62	17	42	58	χ 5	8 5	20	28		
United	1	<u>.</u>				10	3 50	18	23	56	97	2 42	16		
	3	S.P.				30	3	41	46	;	ჯ ჯ	96 16	65	69	
	ì	Ind.				33	દ	34	32		5 5 5	3 6	28	22	
Prussia		Dir.				76	20	2,4	:23		20	30,	3 -	. 6	
		S.P.	7	10	18		30	90			<b>4</b> :	41 8	43.0	54	
		Ind.	45	64 ;	4/		ξ	77			31	% £	7 %	3 %	3
France	Tank	Dir.	48	41	35		Ş	9 6	3 %	c23	56	21	8 5	22	1
		S.P.	4.	4 v	o t	11	19	I.)	5 7	16	12	16	× 5	77	(11)
1,54	Britain	Ind.	69	27	98	27 24	89	£ 5	S &	3 2	59	61	∑ 2	(36)	(nc)
	Great Britain	Dir.	26	2 2	18	30,	14	10	∞ ō	2 %	<u>5</u> 2	25	95	12	( <del>†</del> ‡)
		S.P.	12	23			+9	16	8 8	77 %	26	37	56	45	<del>4</del> 5
	ਲ	Ind.	35	33	36	<del>&amp;</del> 4	20	45	49 ?	‡ ć	3 6	31		20	29
	Austria	Dir.	53	8 <del>4</del> 48	27	3 6	4	39	25	52 5	35	32		78	78
Taore		Year	1760	1770	1790	1800	1820	1830	1840	1850	1850	1880	1890	1900	1910

combine central and regional government taxes have been included in direct taxes. Notes: Austrian, British, and French figures only for central government. Prussian and U.S. figures figures as explained in the text and in Appendix Tables A.6 and A.12. For the U.S. states, business British figures for 1910 actually 1911. The 1910 figure is also given in Appendix Table A.7. Sources: See tables for individual countries in Appendix Tables A.6–A.12. had to live under more particularistic restraints, accepting the yields of time-honored taxes and the tax exemptions of their political allies. In theory they could tax as they liked, but in practice – as I have emphasized throughout – monarchy involved continuous factional negotiation. Perhaps monarchies would remain more trapped in the politics of fiscal crisis than party democracies. But salvation came from an unexpected source.

Table 11.6 reveals the overall trend in the sources of ordinary gross revenues extracted by central states. Three preliminary points should be made:

- 1. "Gross" means that, wherever possible, the costs of collection have been added to the profit yielded by a revenue source (which is net revenue). This means that sometimes I have deviated from more commonly used statistics for example, adding total expenditures of the U.S. Post Office to profit, which alone appears in the usual sources for U.S. revenue statistics.
- 2. "Ordinary" means I have excluded all loans (and the occasional surplus held over from previous years) from the calculation. The exclusion of loans is far from ideal, but source data on loans vary greatly among countries and are often incomplete. Nonetheless, the available loan data do reveal a trend: Loans were more frequent in the early part of the period because wars were more frequent. They revived during the financing of the midcentury railway boom, and then declined, appearing only at times of crisis (more frequent in Austria than elsewhere). The borrowing and issuing of money - now usually paper money - became less an ad hoc resort to moneylenders, wealthy foreign allies, and coinage debasement than a systematic, conscious attempt to finance expenditure through mild inflationary expansion. The policy indicated limited consciousness of the existence of an economic "system" and (along with tariff policy) a minimal sense of state economic responsibility. As long as the economy grew, which it usually did, the policy worked quite well at providing moderate sums of money painlessly. Hence Table 11.6 omits another minor, but nonetheless useful, fiscal painkiller.
- 3. Although my Austrian, British, and French data are straightforward, American and Prussian-German data present problems. The United States and Germany (after 1871) had federal regimes in which specific revenues were constitutionally transferred to the central government almost entirely specified customs and excise taxes. Yet their regional governments drew from the varied resources found at all levels of government in other countries. Therefore, comparing the central-government revenue sources of Germany and the United States with those of the other countries would produce entirely artificial results.

We should also include data from their local-regional governments. In Germany my solution in Table 11.6 is to continue counting Prussian revenue data after 1871 (when Prussia became one of the Länder regional governments of the new Reich) and add to this the estimated Prussian contribution to the revenue of the federal Reich state. These two sums are separated in Appendix Table A.9. Prussia was, after all, the relevant state before 1871 and it still comprised almost two-thirds of Germany afterward. In the United States there was no individual state government as dominant as Prussia, so I have calculated per capita figures for states whose revenues are known and added them to the federal government's. Some estimated aggregation has been involved here, as in the early part of the period not all states preserved their revenue accounts. Details are given in Appendix Tables A.11 and A.12. These two levels of government in Prussia-Germany and the United States roughly correspond to central government in the other countries.

Each country has its own distinctive combination of revenues. There is no simple general explanation of differences. Level of economic development does not predict revenue sources. Representative state crystallizations help explain one revenue preference - monarchies preferred "state property" - but industrializing regimes apparently had choices and diverse influences entered into them. The most common overall pattern, with the United States deviating, is that taxation declined as a proportion of overall revenue as revenue from state property increased. In Austria, France, and Prussia, direct taxes fell dramatically; indirect taxes, far less so. In Britain and the United States, direct taxes fluctuated around a moderate norm, and indirect taxes declined slightly (only marginally in the United States). I consider the three revenue types in turn:

1. Direct taxation went through three modern phases, dominated by land taxes, wealth taxes, and finally (but only after our present period) by income tax. Land taxes had long been the staple direct tax, levied on the overall size and locally assessed value of land. Landowning notables had assessed themselves and their local peasants. In the more commercial Britain and the United States, flourishing land markets meant value could be assessed with some accuracy. All state elites were deeply embedded in their landowning classes and could not easily wriggle free of their control on an issue that affected so directly their economic interests. With industrialization, landowners' cooperation and peasant submissiveness declined. They protested it was unfair for agriculture to fund the state while industry escaped lightly. Notable parties warned ominously of peasant insurrection. They were heeded. British land taxes were abolished in 1816. Less advanced economies continued longer with land taxes, but at lower rates of extraction - as with Austria's main land tax, the military contribution. States now had to turn elsewhere for major revenue.

They turned to taxes on external manifestations of wealth, such as houses and industrial buildings. Taxes on luxuries like carriages and servants were experimented with in the late eighteenth century, but the yield was hardly worth the high assessment costs. The French revolutionaries radically extended wealth taxes into what became later known as les quatres vielles, unchanged from 1799 to World War I. "The four old ones" were taxes on real property, on the rental value of lodgings, on commercial and professional license fees, and on the numbers of windows and doors in real property. Other states improvised on these models, but without a revolution they could exact less from those in whom they were so embedded. Around 1900, Britain, France, and Germany added inheritance taxes, levied with the aid of probate documents. The United States developed corporation taxes, especially on corporations that benefited from state regulation, like railroads and insurance. At maximum, in France, wealth taxes might generate about 20 percent of revenue. Other countries got far less. This was no major solution to their needs.

Unlike most historians of taxation (e.g., Webber and Wildavsky 1986: chapter 6), I skip quickly over the income tax because it contributed little to overall revenue. American Civil War politicians had high hopes for the income tax, but it yielded little and was then declared unconstitutional. Only after 1911 did it begin to have a permanent revival. British governments were rife with income tax schemes, from Pitt's 1799 scheme on (Levi 1988: chapter 6). At the height of the Napoleonic Wars, it provided almost 20 percent of total revenue. It was abandoned in 1816, modestly revived by Peel in 1842, intermittently expanded thereafter, and imitated across Scandinavia and Germany.

But income taxes yielded little, being really modest extensions of wealth taxes. They were levied at low rates only on some wealth sources and only on income above quite high levels. Income taxes were self-assessed; taxpayers filed their own worth to local commissioners under oath. This had worked during the Napoleonic Wars, when propertied classes felt they were fighting for their own "nation," but the practice could not be sustained in peacetime. An income tax was also difficult to assess. It could not be deducted "at source," except from government employees, until formally accounted waged and salaried employment predominated. Most people could not be assessed because they had no regular, formally recorded income. Income taxes were levied on only a minority of households in almost every country

(Denmark appears exceptional) until after World War I (Kraus 1981: 190-3).

Table 11.6 shows that only Britain and the United States maintained their level of direct taxation through most of the period. But their initial level was quite low. As the other countries' levels dropped, all except for Prussia ended, in 1910, with fairly similar levels, in the range of 16 percent to 28 percent of total revenue. But if we continue forward one more year, to 1911, we can see British direct taxes suddenly surge from 27 percent to 44 percent of total revenue. This surge was contributed by Lloyd George's radical extension of income tax and inheritance tax, a conscious attempt, the first since the French Revolution, to soak the rich. The Liberal party represented a mixed class-religious-regional constituency favoring redistributive politics, financing growing expenditures with progressive direct taxation rather than with regressive indirect taxes deriving from tariffs or sales taxes (Hobson 1991). American Progressives sought similar reforms, though as yet without success.

A reformist regime strategy was just emerging from some party democracies, embodying redistributive income taxes, later to dominate government theory, if not always government practice. Income tax became a potent form of social redistribution as well as of state revenue when its actual collection was both bureaucratized and legitimated. This was to happen during and after World War I, indicating considerable growth in state infrastructural powers.

But with this exception, direct taxes were not popular among nineteenth-century states. Society was no longer agrarian, but it was not yet industrial. Simple forms of direct taxation on agriculture were yielding less, and industry could not be milked, because it had not yet brought sufficient accounted waged and salaried employment. Moreover, during industrialization direct taxation was technically easier on the rich, but the rich controlled the state and were reluctant to tax themselves.

2. Could regimes turn to *indirect taxes*, the traditional regressive mainstay of agrarian states, passing the burden of taxation from those in whom they were embedded? Customs and excise-sales taxes were levied on goods in visible transit and at borders, ports, and marketplaces where even agrarian states had possessed a measure of infrastructural power. But even here levying techniques remained simple and particularistic. Throughout, at least half of indirect taxes came from a handful of goods, usually salt, sugar, tobacco, and alcohol. The last two taxes were (and still are) also legitimated by moral disapproval of vice, so were easier to impose. Such taxes were usually supplemented by more general customs revenues, especially on

imported foodstuffs. Indirect taxes thus fell disproportionately on subsistence items and on fairly universal drugs like alcohol and tobacco. They were regressive, especially hard on the urban poor. Eighteenth-century states were fiscal reactionaries, especially commercially buoyant states like the Netherlands and Britain, deriving 70 percent of revenue from indirect taxes (Mathias and O'Brien 1976). But the revolutionary decades taught propertied "peoples" to fear "populace" rioting against high prices on subsistence items. This spurred the successive hikes in income tax during the Napoleonic Wars. Reminded again in 1848, ruling classes eased the burden for good. Indirect taxation declined everywhere.

So were states caught in a more intense version of their traditional fiscal dilemma – to alienate their propertied supporters or their excluded populaces, to risk coup from within or revolution from below? Luckily, however, two solutions were at hand, the relative decline of total expenses and the growth of a third type of revenue.

3. State property consisted of revenue derived either from royal or from nationalized property or from selling government privileges and monopolies. Traditionally, such property had largely consisted of royal-domain land, supplemented by legal fees and the sale of privileges. These items declined greatly in relative (sometimes also in absolute) terms, although the U.S. federal government benefited during the midnineteenth century from its unique ability to sell off what it called "virgin" land – Indians simply were not counted as landowners.

But regalian rights could be modernized and extended. Fees could be charged and monopolies and privileges granted and then supposedly "regulated" over an expanding range of economic and professional services, from banking, insurance, and transportation to medical, architectural, and legal services. The state's cut was solemnized with an array of seals and stamps. Such revenue sometimes overlapped with direct taxes on corporations (making my allocation of a revenue item to one or the other category, direct taxes or state property, occasionally rather arbitrary). Other forms of state property are easier to distinguish. The state's postal monopoly could generate a profit. Then we must add the traditional peculiarity that private property had only ruled "above ground," as it were. The crown's regalian rights had included a share in the profits of mines and ports. Expanding mining and shipping brought increasing revenue, with or without outright state ownership. State roads, canals, and especially railways also generated tolls and fares. Canals dominated the revenue of some U.S. states in the early nineteenth century; railways were significant almost everywhere later. Most of these new or expanded state functions were useful services, noncontroversial, even popular. On the revenue side they had the

advantage that they might pay for themselves and even turn a profit.

All states derived revenue from their property, but to different degrees. States benefiting most owned and ran railroads and other industries (usually mines and other communications industries). Railroads were the biggest money spinners, and Prussia was their main exploiter, taking over virtually all private railroads in the early 1880s. In 1911, Prussia drew no less than 58 percent of its own account revenue and 47 percent of total revenue (including its Reich contribution) from its ownership of the railways. Fremdling (1980: 38) observes that the Prussian state was probably the biggest entrepreneur in the world, yet had a statist conception of "profit." Freight and passenger rates were influenced by its fiscal-political goals, especially to evade direct or indirect taxation that involved negotiations with the Prussian or Reich legislative authorities.

The United States and Britain depended least on state property. It is difficult to know whether their laissez-faire economic philosophy or their party democracy accounted for this. The latter meant they had no political preferences among revenue sources, as all levies, including those from state property, required the assent of parliaments. It was otherwise in the two monarchies and (to a lesser extent) in more statist France. In Prussia choice of revenue was always as political as technical. As Richard Tilly (1966) emphasizes, direct and indirect taxation and borrowing implied consent from some organized body in civil society, which the regime preferred to avoid. State property offered "insulated" fiscal resources. But the Austrian regime failed to achieve this, in the late 1850s being forced to sell much of its railway network for cash. Autocratic Russia achieved greater revenue insulation: By 1910, a third of revenue came from railways and a third from its monopoly over liquor sales (Hobson 1991).

State property had broad appeal in monarchies. To the state elite it offered potentially autonomous fiscal resources; to political parties it appeared to offer less fiscal pain than taxes. Here representative crystallizations do predict: Party democracies had no political preferences for one type of revenue over another. Other regimes preferred, and sometimes attained, state property revenue because it provided insulated power from civil society. Monarchy had found tax relief.

In this period, states eased away from the fiscal crises that had fueled representative struggles for many centuries. Mainly at peace, with booming economies, and able to inflate the currency mildly, they were asked to perform new state functions that often could pay for themselves and sometimes could make large profits. The drive for representation was not at an end. With commercial and industrial capitalism generating extensive classes, how could it be? But it had lost

its traditional fiscal bite. It would find new bites, but in the meantime the late nineteenth century provided tax relief on a world-historical scale.

## Civil and military personnel and bureaucracy

The other measure of state size used in onward-and-upward stories is the number of personnel, but that presupposes we – or, indeed, the states of the period – could count them. Whether states could count is significant: If a state cannot count its officials, it cannot be remotely bureaucratic. Table 11.7 contains such personnel totals as I have unearthed. Though incomplete, especially on civil employment, they are more nearly complete than any previous compilation.

States at least knew the size of their armies. Available figures are of three types: the smallest comprise field armies and operational navies; the largest denote "paper strengths," or those notionally mobilizable; and middling numbers indicate those actually usable for all military purposes (i.e., not just fighting troops). I have tried to estimate this middling number: forces actually under military discipline at any one time – field armies, garrisons, headquarters and supply staff, and reserve troops and militias if actually mobilized ("embodied" in British source material), plus active naval personnel at sea and in port and supply establishments.

I have not used paper strengths and advance estimates for the purposes of extracting funds from parliaments. The paper strength of the Grundbuchstand has led to substantial overestimations of Austrian forces, and reliance on advance estimates to small inaccuracies for Britain (these are used, for example, by Flora 1983 and for the navy up to 1820 by Modelski and Thompson 1988). I exclude militias and reservists not actually called to the colors but include nationals serving abroad, including those in colonies, as well as European mercenaries financed by the state being counted. This is particularly important for eighteenth-century Britain, whose substantial Hessian and Hanoverian contingents are sometimes overlooked. But I have excluded troops recruited from colonies. Thus, for example, the total armed forces of the British Empire were greater than my figures indicate, but their proportion of the empire's population would be far less. In this case the small army necessary for keeping down India compared to its population of 200 million would give a severe underestimate of British militarism compared to that of other Western states. The reliability and validity of the military data for comparative purposes are good.

It is quite otherwise for civilian personnel. The most important

finding of the research underlying Table 11.7 is that no state knew the number of public officials until the end of the nineteenth century. A thorough combing of the archives would unearth more figures comparable to these, but they would still not be figures of total public officials. My early figures, apart from France, total only officials countable by the central state. Where these counts were absurdly small, I have not included them. Thus Prussian government records for 1747-8 and 1753-4 enable Johnson (1975: appendix I) to construct a total of about 3,000 persons considered by the king and ministers as responsible to them. This does measure the Prussian "civil service," but it was a tiny proportion of all those who exercised public functions in Prussia. It is also far less than the 27,800 officials working on the Prussian royal estates in 1804 (Gray 1986: 21). The Prussian civil state thus consisted of a small administrative core, controllable from the center; a decentralized royal demesne administration; and an uncontrollable, unknowable but large administrative penumbra. The first two might be potentially insulated from civil society (in rather different ways); the third was thoroughly embedded. Thus it would be absurd to call the Prussian state "bureaucratic," as do most historians. (I pursue this issue further in Chapter 12.)

Austria (along with Sweden) was first to produce occupational censuses, including censuses of officials, in the mid-eighteenth century. Then, about 1800, the United States and Britain counted their central state officials. All counts were only of full-time officials above a certain level. The French figures in my table differ. They are the estimates of present-day historians as to the total numbers exercising public functions, far higher than contemporary counts for any country. If we could make such estimates for other countries we would arrive at much higher figures for them too. For example, in Table 11.7 British figures up to the 1840s do not include local land tax collectors for the very good reason that no one knew how many there were. They were guessed to be between 20,000 and 30,000, more than the total counted civil service personnel (Parris 1969: 22). In France, Finance Minister Necker estimated 250,000 people helped in the collection of revenue but guessed - admitting there was no precise record - that only perhaps 35,000 did it full time, depending on the office for their livelihood (1784: 194-7). Only with mid-nineteenth-century bureaucratization (discussed later) were most public functionaries counted.

The very concept of state employment, and consequently also of bureaucracy, is not applicable before the late nineteenth century. Who was "in" the state? The state elite comprised a few people working at the upper levels of ministries, departments, and boards in the capital,

plus a few important regional officers. Courtiers were also at the heart of the state, as the court was the central political institution in most capitals. Yet courtiers were hardly state employees. They were privileged nobles and their clients, usually with hereditary embedded rights to their positions. What we might call the "local state elite" included some salaried officials, though not necessarily the highest ones. These might be part-time local notables acting as justices of the peace, Landräte, maires, and the like. Were these "in" the state? Were the members of semi-autonomous corporate organizations like the judges in the French parlements "in" the state? The universal uncertainty here is whether the embedded local notables who normally exercised the main civil functions of the state at regional and local levels were really "in" it at all. They were almost all part timers, yet their functions were central to the very existence of the state. The answer is clearly that when state administrations are so directly embedded in their civil societies, it makes only limited sense to talk of an "it" at all. The "state" was not as a totality a coherent elite, distinct from civil society. "It" did not exist.

The reach of "state employment" was also blurred at the lower levels and this lasted longer. Routine manual and clerical tasks were performed full time by casual workers, who were not at first counted in official records. The best-organized government office of the eighteenth century was probably the British Excise Department. In 1779, its central bureau employed almost 300 full-time officials. But in that year a document incidentally reveals a further 1,200 working as casual clerical labor (Brewer 1989: 69). Thuillier (1976: 11–15) notes that casual *auxiliaires* were still almost as numerous as *employés* in the Finance Ministry as late as 1899. Although by then they were counted in the French census (and so appear in Table 11.7), it is not clear when they had begun to enter the official statistics. Van Riper and Scheiber (1959: 56–9) estimate that American personnel were undercounted by perhaps 50 percent until 1816 and by about 25 percent for the rest of the period.

Undercounting also obscures the rise of female public employment. At the end of the century, most casual workers were women, but their rise remains obscure. By 1910, women composed half the public employees in Britain and the United States but represented only a quarter in France and Austria. Were these differences real? Confidence is undermined in the most detailed census of the period, that of France. This suggests a sudden discontinuity in female public employment. Having increased steadily to 333,000 in 1891, it then plummeted to 140,000 in the next census, that of 1901, before rising steadily again. This is probably an artifact, the result of suddenly excluding

part-time employment and schoolteachers. Census estimates of female employment in this period are generally unreliable. Bose (1987) has reanalyzed U.S. census manuscripts for 1900 to guess that the official census figure of 20 percent for women working should be more than doubled. We cannot establish overall trends without further research on exact census procedures, work organization, and gender in each country.

My earlier figures derive from limited counting exercises – of what the two Germanic states called *Beamten* and the French called *fonctionnaires* – males of official, quasi-professional status formally employed by the state hierarchy (excluding the independent professionals counted among the *Beamten*). Then across midcentury counting ability extended across local-regional government and downward to manual and clerical workers. By about 1890, virtually all those exercising official public functions – *except* in the overlapping categories of the lowest level and female employment – were counted in censuses. They are so counted in Table 11.7. Subsequent civilian growth can be treated as largely real.

So we cannot interpret the upward civilian employment trend in the apparently obvious way (as do most writers, e.g., Anderson and Anderson 1967: 167; Flora 1984; Grew 1984). The absolute and proportionate trends seem dramatically upward. Yet the ability to count was also rising. Only after 1870 was growth almost certainly real. It was then rapid, especially in local-regional government. This reinforces the conclusion reached about expenditures. Late nineteenthcentury states' civil activities grew substantially. Before then, the growth was less in real size than in the ability to count officials. Yet this ability was itself significant, reflecting a real growth in full-time state employment. States now had officials dispersed through 5 percent to 10 percent of the families of their territories, accountable to (and countable by) their superiors in local, regional, or central government. Outside of the United States, and sometimes of Austria, there was also considerable coordination between these levels. States were now potentially rooted amid a broad swathe of "state loyalists," whose distinctive politics I explore in Chapter 16.

The military trends are far clearer. Except for the United States, the highest armed forces, absolutely and in proportion to the population, appeared early, either in the Napoleonic Wars or the Seven Years' War. American military commitment was far lower except during the Civil War. Then it reached as high a proportion as that of any other country during this period: 4.3 percent of the North's population, 3.7 percent of the Confederacy, and 7.1 percent of the Confederacy excluding slaves. (Almost no slaves were in the Confederate armed

Table 11.7. State employment for Austria-Hungary, France, Great Britain, Prussia-Germany, and the United States, (as percentage of total population) 0161-0911

	Civilian personnel	ersonnel													
	Central state	ate				All levels					Military personnel	ersonnel			
Year	Austria- Hungary	France	Great Britain	Prussia- Germany	United States	Austria- Hungary	France	Great Britain	Prussia- Germany	United States	Austria- Hungary	France	Great Britain	Prussia- Germany	United States
1760	90.0		0.26			0.17					1.66	1.78	2.36	4.14	
17/0	20.0						;				1.17	0.82	0.58		
1,00	0.03				6		1.29				1.41	0.89	2.76	3.76	
1000			9		70.0		1.01				1.52	0.85	0.97	3.42	0.02
1010			0.18	0.3/	0.04	(	0.91				1.35	2.93	4.91	3.73	0.12
1070			0.74		0.03 0.03	0.12					2.38	3.66	5.30	3.88	0.16
1020	36.0		0.22		0.07	ļ							1.02	1.33	0.16
1040	0.33	,,	0.17		0.09	0.37					1.38	1.23	1.01	1.15	0.09
1050	0.37	0.20	č	0.11+	0.11	0.41		0.29			1.56	1.02	1.10	1.05	0.13
1860	0.40	0.41	0.74	0.20+	0.11	0.45	0.84	0.41	0.33		1.56	1.09	1.20	1.04	0.09
1070				i	0.12	0.57	;	0.41	0.47		1.60	1.23	1.74	0.82	60'0
1000		0.00		0.55	0.13	0.50	1.11	0.53	1.15		98.0	1.66	1.14	96.0	0.13
1000	,	0.8/	0		0.19 0.19	0.53	1.53	0.46	1.56		0.73	1.40	96.0	96.0	0.07
1890	97;	0.91	0.32		0.25	2.92	1.83	0.99	1.70		0.79	1.47	96.0	1.07	0.06
	1.14	1.10	0.40		0.31	3.30	1.80	1.66		1.36	0.88	1.59	1.51	1.12	0.17
1910	1.17	1.40	0.64		0.42	3.15	2.14	2.60	1.57	1.68	98.0	1.65	1.04	1.05	0.15

For sources and footnotes, see Appendix Tables A.1-A.5 containing data

forces.)<sup>3</sup> This expansion was paralleled in civilian state employment. The federal state counted 37,000 officials in 1860. By 1861–2, the two warring states counted about 170,000 (Van Riper and Scheiber 1959: 450). In this respect, the American Civil War probably resembled World War I more than it resembled earlier European wars (which did not cause civilian personnel to rocket).

The high quality of military figures allows comparisons among states, and there were great differences among them. Prussia began the period with the largest military mobilization, then declined before partially reviving in the later German Reich. Contrary to popular liberal stereotypes, Great Britain managed the highest level of military mobilization seen in Europe during this period, in the Napoleonic Wars. Thereafter, France tended to have proportionately the largest armed forces, and Austria had the smallest among the European Powers. The decline of Austria as a Great Power was revealed in its falling behind its rivals' mobilizations, as contemporaries realized.

These figures permit two conclusions. First, they confirm, with admittedly imperfect figures, the fiscal trends. Although we cannot be certain about the nature of civilian employment, the overall growth in state employment was again less marked than the changes in its internal composition. Military employment declined greatly (except for the United States), and civilian employment grew formally over the earlier years of the period and in substance over later years. This is consistent with expenditure data. Second, taking the ability to count personnel as a minimal level of bureaucratization, this had already arrived in 1760 for the military but took at least another century for the civil state.

#### **Provisional conclusions**

I evidenced two great sea changes in the life of the modern state. Eighteenth-century states suddenly became massive in relation to their civil societies. Whether we regard nineteenth-century states as growing depends on the measure used. Expenditures grew enormously in money terms and moderately if we control for inflation and population growth. But in relation to the growth of civil society in this period, most states actually declined. The long nineteenth century was

dominated more by private economic growth than by state expansion – unless war dictated otherwise. Yet this conceals the second sea change – two great nineteenth-century shifts in the nature of states:

- 1. State functions shifted from their traditional narrow military crystallization toward three enlarged civilian roles. The greatest and most uniform provided new material and symbolic communications infrastructures. The second, found especially among monarchies and latecomer industrializers, increased state intervention in the economy. The third and latest, found at the very end of the period in some of the most advanced economies, provided modern forms of social welfare. Together these enlarged civil roles clearly mark the transition toward a new diamorphous half-military, half-civil state.
- 2. I have only provisionally suggested the second dramatic shift. States became largely bureaucratized during the period, but earlier in their military than their civilian administration. Bureaucratization lessened direct office embeddedness. Was this replaced by less direct, perhaps more democratic, forms of embedding? Or did bureaucratization lead to the insulation of a large number of state loyalists from civil society? Were the same patterns evident in civil and military state institutions?

The development of the modern state was a more complex, differentiated process than onward-and-upward theory suggests. There appeared a less fiscally exacting, more consensual state. But this overall trend emerged through three distinct processes: a military that was relatively declining but becoming more professionally and bureaucratically distinct and potentially insulated from civil society; increasing bureaucratization, first in the military, then in the civilian, state, and a civilian state perhaps consensually increasing its scope. These are the themes of the next three chapters, respectively.

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<sup>&</sup>lt;sup>3</sup> Civil War figures are from Coulter (1950: 68 – population); Kreidberg and Henry (1955: 95 – Union military actually serving in 1865); and Livermore (1900: 47 – Confederate military serving in 1864, assuming 80 percent of those enrolled were under arms, as in the Union forces). These are persons enrolled at any one time. Obviously the proportion enrolled at some point in the Civil War was very much higher.

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