

FIGURE 2. TABLE OF MILITARY BASIC PAY

MONTHLY BASIC PAY EFFECTIVE 1 JANUARY 1995

Pay Grade	YEARS OF SERVICE															
	Under 2	2	3	4	6	8	10	12	14	16	18	20	22	24	26	
Commissioned Officers																
O-10	6978.30	7223.70	7223.70	7223.70	7223.70	7501.20	7501.20	7916.70	7916.70	8482.80	8482.80	9016.80	9016.80	9016.80	9016.80	9016.80
O-9	6184.50	6346.50	6481.80	6481.80	6481.80	6646.50	6646.50	6923.10	6923.10	7501.20	7501.20	7916.70	7916.70	7916.70	7916.70	8482.80
O-8	5601.60	5769.60	5906.40	5906.40	5906.40	6346.50	6346.50	6646.50	6646.50	6923.10	6923.10	7501.20	7501.20	7501.20	7501.20	7686.00
O-7	4654.50	4971.00	4971.00	4971.00	4971.00	5494.80	5494.80	5769.60	5769.60	6346.50	6346.50	6783.00	6783.00	6783.00	6783.00	6783.00
O-6	3449.70	3790.20	4038.60	4038.60	4038.60	4038.60	4038.60	4176.00	4176.00	4836.30	4836.30	5193.90	5193.90	5193.90	5193.90	5680.80
O-5	2759.10	3239.70	3463.80	3463.80	3463.80	3588.50	3588.50	3760.80	3760.80	4313.10	4313.10	4560.00	4560.00	4560.00	4560.00	4862.70
O-4	2325.60	2832.00	3021.00	3021.00	3021.00	3270.30	3270.30	3432.00	3432.00	3516.30	3516.30	3516.30	3516.30	3516.30	3516.30	3516.30
O-3	2161.20	2416.50	2583.30	2583.30	2583.30	2994.90	2994.90	3270.30	3270.30	3516.30	3516.30	3516.30	3516.30	3516.30	3516.30	3516.30
O-2	1884.60	2058.00	2472.90	2472.90	2472.90	2608.80	2608.80	2608.80	2608.80	2608.80	2608.80	2608.80	2608.80	2608.80	2608.80	2608.80
O-1	1636.20	1703.10	2058.00	2058.00	2058.00	2058.00	2058.00	2058.00	2058.00	2058.00	2058.00	2058.00	2058.00	2058.00	2058.00	2058.00
Commissioned Officers with Over 4 Years Active Service as Enlisted Members																
O-3	0.00	0.00	0.00	2858.10	2994.90	3102.30	3270.30	3432.00	3568.50	3568.50	3568.50	3568.50	3568.50	3568.50	3568.50	3568.50
O-2	0.00	0.00	0.00	2556.00	2608.80	2691.60	2832.00	2940.60	3021.00	3021.00	3021.00	3021.00	3021.00	3021.00	3021.00	3021.00
O-1	0.00	0.00	0.00	2058.00	2199.00	2280.00	2362.50	2444.40	2556.00	2556.00	2556.00	2556.00	2556.00	2556.00	2556.00	2556.00
Warrant Officers																
W-5	2202.00	2362.50	2362.50	2416.50	2526.30	2637.60	2748.30	2940.60	3077.10	3185.10	3270.30	3270.30	3270.30	3270.30	3270.30	3270.30
W-4	2001.30	2170.80	2170.80	2199.00	2224.50	2387.40	2526.30	2608.80	2691.60	2772.00	2858.10	2909.70	2909.70	2909.70	2909.70	2909.70
W-3	1752.90	1896.30	1896.30	1951.50	2058.00	2170.80	2233.30	2335.80	2416.50	2501.40	2583.30	2664.60	2664.60	2664.60	2664.60	2664.60
W-1	1460.10	1674.30	1674.30	1814.10	1896.30	1977.60	2058.00	2143.20	2224.50	2307.30	2387.40	2472.90	2472.90	2472.90	2472.90	2472.90
Enlisted Members																
E-9	1499.70	1619.10	1678.80	1737.90	1797.00	2148.00	2209.80	2268.00	2678.40	2739.90	2801.40	2855.70	2855.70	2855.70	2855.70	2855.70
E-8	1290.30	1406.40	1464.90	1527.30	1584.60	1641.60	1701.90	1789.50	2062.50	2121.00	2179.80	2208.30	2208.30	2208.30	2208.30	2208.30
E-7	1132.20	1232.40	1292.40	1348.50	1437.30	1495.80	1554.90	1612.20	1641.60	1641.60	1641.60	1641.60	1641.60	1641.60	1641.60	1641.60
E-6	1056.00	1115.40	1181.10	1272.00	1322.40	1322.40	1322.40	1322.40	1322.40	1322.40	1322.40	1322.40	1322.40	1322.40	1322.40	1322.40
E-5	995.10	1049.70	1091.40	1134.60	1134.60	1134.60	1134.60	1134.60	1134.60	1134.60	1134.60	1134.60	1134.60	1134.60	1134.60	1134.60
E-4	957.60	957.60	957.60	957.60	957.60	957.60	957.60	957.60	957.60	957.60	957.60	957.60	957.60	957.60	957.60	957.60
E-3	854.40	854.40	854.40	854.40	854.40	854.40	854.40	854.40	854.40	854.40	854.40	854.40	854.40	854.40	854.40	854.40
E-2	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20
E-1	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20	790.20

SOURCE: Reproduced from Department of Defense, *Selected Military Compensation Tables January 1995 Pay Rates*, p. A2.

CHAPTER III

PERFORMANCE INCENTIVES OUTSIDE THE PAY SYSTEM

Pay is only one of the inducements for members of the military to excel and seek promotion. Higher rank confers status and privilege as well as higher pay. Failure to be promoted, in contrast, can exact a severe penalty: separation from the military. Those features of the military may compensate for monetary incentives that some see as too weak.

STATUS AND PRIVILEGE AS PERFORMANCE INCENTIVES

Higher positions in any organization convey some measure of privilege, standing, and authority over subordinates. In the military, such features extend beyond the immediate workplace and are reenforced by the visible insignia of rank. Members are assigned on-post housing based on rank, for example, with officers' housing in different areas than that of enlisted members. Within those broad categories, members are further grouped by rank, and the higher-ranking groups are assigned to different and better housing areas than the groups of more junior members. The authority that a person of higher rank can exercise applies not only to that person's assigned subordinates, as in the civilian world, but to anyone of lower rank, and there is no truly off-duty time when a junior member is not bound to obey any lawful order of a superior. Deference to superiors is expected, most notably in the form of the salute that members render to any superior officer. Finally, there is the ultimate authority—and responsibility—that goes with command in the military, whether it is a lieutenant leading a platoon of 40 men into combat when only 25 years old, a naval officer commanding a warship before he or she reaches 40, or a theater commander directing the actions of hundreds of thousands.

Do unique factors of status and privilege imply a different role for direct pay in the military than in the civilian world? In particular, can they compensate for monetary incentives that may be too weak by themselves? Those questions cannot readily be answered, but some indications appear in the behavior of military officers. In their decisions to stay in the military or to leave, officers appear to be remarkably unaffected by changes in their pay compared with private-sector pay levels. This seeming indifference is reflected in the small number of studies of officers' pay responsiveness, in sharp contrast to the host of such studies for enlisted personnel. Once they are eligible to retire, officers seem much more reluctant to leave than enlisted personnel; indeed, the military retirement system began as a means of separating officers who were no longer fit for duty. One possible explanation for the

behavior of officers is that the military pays its officers much more than they could command in the civilian economy; another is that higher-ranking officers enjoy a standing within their community that has few parallels in civilian employment.

UP-OR-OUT RULES AS PERFORMANCE INCENTIVES

When officers are promoted from O-3 (captain or Navy lieutenant) to O-4 at 10 to 12 years of service, they receive raises of about 5 percent in basic pay. That may seem a rather small increment for a first promotion in more than six years, too little to make officers work hard over that period. But if they are not promoted, those officers will be forced to leave the military, forgoing both future military pay (including longevity increases) and military retirement benefits. That may be why junior officers continue to seek promotion despite what the 7th QRMC thought were inadequate pay incentives.

All of the services enforce up-or-out rules—limitations on the total years of service that a member may have without being promoted to the next grade (the “high year of tenure” for the current grade). Uniform rules throughout the services are specified for officers in the Defense Officer Personnel Management Act (DOPMA), which reflects the uniform promotion practices that it also imposes (see Table 2). The services' rules for enlisted personnel vary, reflecting their differing promotion practices.

Up-or-out rules can replace direct pay incentives in encouraging good performance. Even if the pay table for officers offered no raises at all tied to the early promotions, incentives for performance would be strong because the military separates from service an officer who is not promoted through the ranks to major or lieutenant commander (grade O-4).¹ The less restrictive high years of tenure in the enlisted ranks do less to affect incentives, however, which means that pay increases must play a more important role. As shown in Chapters IV and V, the current pay table rewards enlisted promotion more than it does that of officers.

Despite their importance in encouraging service members to strive for certain promotions, up-or-out rules have two limitations. First, they cannot raise good performance to excellent. A member who is motivated merely by the desire to remain in the military may not expend the extra effort required to become a strong candidate for early promotion. Second, the services do not impose high years of tenure as members approach retirement eligibility. A promotion to O-4 (at 10 to 12

1. Raises at the promotion to grade O-2, which occurs at two years of service, and to grade O-3 (at about four years) provide essentially no incentive for performance because almost all officers receive these promotions. That is ironic because those promotions play a substantial role in the calculation of promotion versus longevity raises over an officer's career (see Chapter IV).

TABLE 2. SERVICE HIGH YEARS OF TENURE AND AVERAGE TIMES AT PROMOTION, BY PAY GRADE

	O-1/ E-1	O-2/ E-2	O-3/ E-3	O-4/ E-4	O-5/ E-5	O-6/ E-6	O-7/ E-7	O-8/ E-8
High Year of Tenure^a								
Officer	n.a.	n.a.	14	20	28	30	n.a.	n.a.
Enlisted								
Army	n.a.	n.a.	n.a.	8	13	20	24	27
Navy	n.a.	n.a.	n.a.	10	20	23	26	28
Marine Corps	n.a.	n.a.	n.a.	8	13	20	22	27
Air Force	n.a.	n.a.	n.a.	10	20	20	23	26
Average Years at Promotion from Grade^b								
Officer	2.0	4.0	10.0	16.0	22.0	26.3	28.1	30.0
Enlisted								
Army	0.7	1.1	1.9	4.3	7.8	13.3	17.6	20.6
Navy	0.6	1.3	2.2	3.7	7.8	12.0	16.6	19.6
Marine Corps	0.6	1.1	2.9	5.3	9.5	13.9	18.0	21.8
Air Force	0.5	1.3	3.1	6.8	11.9	15.3	18.5	21.7

SOURCE: Department of Defense, *Report of the Seventh Quadrennial Review of Military Compensation* (August 21, 1992).

NOTE: n.a. = not applicable.

- a. High years of tenure for enlisted personnel are as of 1991. Some of the services have reduced high years for certain grades during the personnel reductions of the 1990s. Higher limits may apply to enlisted personnel on promotion lists.
- b. Average times at promotion for officers through grade O-5 are the midpoints of ranges specified in the Defense Officer Personnel Management Act. Actual times have been somewhat later in recent years.

years of service) generally guarantees that an officer will be allowed to complete 20 years of service. In the enlisted ranks, the Navy and Air Force permit people who reach grade E-5 to complete 20 years, whereas the Army and Marine Corps require grade E-6. Enlistees typically reach those grades before they complete 10 years of service.

CHAPTER IV

PROMOTION VERSUS LONGEVITY IN THE PAY SYSTEM

Officers who advance to successive grades at the usual times will find, over the course of a 20-year career, that their four promotions will have added a total of roughly \$1,200 to their monthly basic pay (based on the 1995 pay table). Over the same career length, 11 longevity increases will have increased those officers' pay by about \$1,900, or more than 60 percent of the total. Personnel rising through the enlisted ranks will typically be promoted more often, but will still find that only about half of the dollar amount of their total raises will have come from promotions.

The Seventh Quadrennial Review of Military Compensation saw in data such as those clear evidence that promotions count for too little and longevity for too much. The group accepted as an axiom that raises arising from promotions should be larger and those accruing from mere longevity should be smaller, noting that:

Basic pay is the principal vehicle for linking compensation to military performance measured by rank. However, ad hoc changes over the past forty years have distorted this linkage so that years of service weigh more heavily than promotion as a determinant of pay. As a result, the distinction between pays of different grades at similar years of service is, in some cases, too small to provide a clear reward for promotion.¹

The 7th QRMC recommended a new table of basic pay that places greater emphasis on promotions in determining the basic pay that a member receives over the course of a military career. The group ignored the role of allowances, however, which may have led it to overstate the apparent problem in the pay system. Housing allowances contribute to the raises that come from promotions but not to those from longevity.

MEASURING THE PAY EFFECTS OF PROMOTION AND LONGEVITY

There are many ways to compare the effects of promotion and longevity on a service member's pay. The numbers cited above reflect the simplest method: attribute each raise either to promotion or to longevity and total each group. The 7th QRMC used an alternative method that may provide greater analytic insight: for each raise, add

1. Department of Defense, *Report of the Seventh Quadrennial Review of Military Compensation* (August 21, 1992), p. 5.

up the stream of future payments for an entire military career. Table 3 illustrates these two methods using data for the first 20 years of a typical officer career, based on the 1995 pay table. As the calculations suggest, the two methods generally yield similar results for the share of total raises attributed to promotions. To facilitate comparisons with the 7th QRMC's results, the calculations throughout this chapter use that group's career-pay method.

Both methods ignore a major contributor to rising pay over the course of a military career: annual across-the-board raises. Those raises, sometimes erroneously called cost-of-living raises, roughly maintain the competitive position of the military as an employer. For the typical officer whose pay growth is depicted in Table 3, across-the-board raises would probably play a more important role in determining his or her pay at the end of the 20 years than either promotion or longevity raises—possibly more than the two combined. Nonetheless, across-the-board raises do not belong in the comparison because they have nothing to do with the structure of the pay table or an individual's progress through a military career.

TABLE 3. ALTERNATIVE METHODS FOR COMPARING RAISES ATTRIBUTABLE TO PROMOTION AND LONGEVITY DURING THE FIRST 20 YEARS OF A TYPICAL OFFICER'S CAREER (Basic pay only, in dollars)

Years of Service	Grade Promoted To ^a	Raises (Per year)		Years Received	Total from Raise	
		Promotion ^a	Longevity		Promotion ^a	Longevity
2	O-2	4,259	803	18	76,658	14,450
3			4,979	17		84,640
4	O-3	3,625	997	16	58,003	15,955
6			1,642	14		22,982
8			1,289	12		15,466
10	O-4	1,940	2,016	10	19,404	20,160
12			2,315	8		18,518
14			1,984	6		11,902
16	O-5	4,277	1,998	4	17,107	7,992
18			2,963	2		5,926
20			1,663	0		0
Total		14,101	22,648		171,173	217,991
Percentage of All Raises		38.4	61.6		44.0	56.0

SOURCE: Congressional Budget Office.

NOTE: Rounded numbers may produce sums that do not correspond to the totals shown.

a. Blanks appear for years of service in which no promotion takes place.

Because both methods deal with pay raises, they also ignore the member's starting pay. Adding starting pay (\$19,634) to the sum of promotion and longevity raises would yield the member's pay level at the end of the illustrative career (\$56,383). Multiplying the starting pay level by 20 (total career length) and adding the result to the sum of promotion and longevity totals from the QRMC method would yield the member's total career basic pay (\$781,852).

Comparisons of raises from promotion and longevity need not be limited to entire careers. As the discussion of up-or-out rules suggested, certain periods within a career may be particularly important: for example, the period between an officer's promotion to major or lieutenant commander (grade O-4) at 10 or 11 years of service and eligibility for retirement at 20 years. Making the comparison for that period would simply involve totaling the raises for years 12 through 20. Alternatively, one might want to examine only the raises during the first 5 or 10 years of service, when members may be deciding whether to pursue a full military career.

The two methods for comparing the effects of promotion and longevity that are illustrated in Table 3, which share a focus on raises, do not exhaust the possible approaches. Both ignore the impact that promotions can have on subsequent longevity increases, which generally—though not always—are larger in higher pay grades. For an extreme example, consider the case of an Air Force staff sergeant (E-5), who, under current up-or-out rules, is permitted to complete a 20-year career. Without another promotion, he or she will stop receiving longevity increases after 14 years of service. With a promotion will come two additional longevity increases, at 16 and 18 years of service. Should those increases, then, be attributed to the promotion? Unfortunately, applying such an analytic approach is very difficult.

Do service members look at specific pay raises to determine how well hard work is rewarded, rather than checking the longer-term effects of promotions on earnings? The former approach seems short-sighted, but gathering all of the information required for a longer view might not be easy. Some oddities in the current table of basic pay also may encourage a focus on raises. The single largest raise that an officer receives over the first 20 years of a career, for example, is the longevity increase that comes when he or she completes three years of service. An enlistee who is promoted to sergeant (E-5) before completing six years of service will receive a smaller raise at that point than either his last or his next longevity increase. For some members, or perhaps even many members, the perceptions that are created by the pattern of their raises may be more important than the actual effect of promotions on pay.

THE CURRENT PAY TABLE COMPARED WITH THE 7TH QRMC ALTERNATIVE

The current pay table appears to reward promotion and longevity about equally for enlisted personnel but not for officers (see Table 4). During a 20-year career, about 48 percent of an enlisted member's gain in total earnings from basic pay—over what starting pay alone would have provided—comes from promotions and the remaining 52 percent comes from longevity increases. Over the second half of that career (10 years to 20 years), or over the period after the initial enlistment tour (4 years to 20 years), promotions typically account for slightly more than half of the gain in total earnings. By contrast, for a typical officer, promotions account for well under half of the amount of total basic pay coming from raises; in the later periods, promotions account for less than 30 percent.² Those later periods probably provide a better indication of the importance of officer promotions because the first two officer promotions—at two and four years of service—are so nearly automatic that the pay raises associated with them could easily be described as longevity increases.

Some of the difference between officers and enlisted members in the relative importance of promotions and longevity may derive from the structure of the pay table, but an important contributor is the less frequent promotions of officers, particularly in the later years of their careers. A typical enlisted member may receive six or seven promotions over a 20-year career, with two of them in the last 10 years. Officers, however, generally receive only four promotions in 20 years, and only one in the last 8 to 10 years.

The 7th QRMC's proposed pay table would increase the size of promotion raises and reduce the size of longevity increases. For enlisted personnel, the table would add 7 percentage points to the share of promotions in total pay increases over a 20-year career. For officers, the table would add more than 10 percentage points. Perhaps more important, the proposed table would have its greatest effect on officer pay in the periods from 4 to 20 years of service and from 10 to 20 years of service, where the current table rewards promotion much less than longevity.

2. The representative officer discussed here receives successive promotions at 2, 4, 10, and 16 years of service, the middles of the ranges under the guidelines of the Defense Officer Personnel Management Act (DOPMA). The actual timings of promotions have tended to be somewhat later in recent years. Using actual timings to make the comparisons of promotion versus longevity would have little effect as long as the years of service being examined were adjusted so as to exclude the same promotions. That is, instead of 4 to 20 years, examine 4.5 to 20 years to exclude the promotion to O-3.

TABLE 4. INCREASES IN TOTAL BASIC PAY ATTRIBUTABLE TO PROMOTIONS, OVER SELECTED PERIODS OF TYPICAL CAREERS, COMPARED WITH INCREASES FROM PROMOTIONS AND LONGEVITY COMBINED (In percent)

Pay Table	Years of Service		
	0 to 20	4 to 20	10 to 20
Enlisted			
Current	48.3	51.9	52.8
7th QRMC Proposal	55.2	58.5	61.1
Officer			
Current	43.9	26.2	27.8
7th QRMC Proposal	54.5	40.4	41.8

SOURCE: Congressional Budget Office. Promotion timings are based on data in Department of Defense, *Report of the Seventh Quadrennial Review of Military Compensation* (August 21, 1992).

NOTE: Excludes annual across-the-board raises. The numbers reported here differ somewhat from those reported by the 7th QRMC for a given pay table and career length. The calculations are based on months of service; the 7th QRMC apparently used whole years. Another source of difference may be the way in which longevity and promotion raises that occur in the same period are treated. In general, at a given year of service the longevity raise is larger in the higher pay grade. Thus, calculating the longevity raise first, and then the promotion raise, attributes more to promotion and less to longevity than if the calculations were performed in the opposite order. The calculations consistently use the former method; the report of the 7th QRMC does not explain how it resolved the ambiguity.

ACCOUNTING FOR ALLOWANCES

Focusing exclusively on basic pay creates a misleading impression of the relative rewards for promotion and longevity under the current pay system. Housing allowances—or their in-kind equivalents—increase when members are promoted but do not depend on years of service. Thus, accounting for allowances increases the apparent reward for promotion (see Table 5). Including all of regular military compensation (RMC), which incorporates both housing and subsistence allowances and the tax advantage that accrues because those allowances are not subject to federal income tax, raises the share of promotions in total pay increases under the current pay table to well over half for both officers and enlisted personnel.

Based on total RMC, the current pay table already provides the same rewards for promotion that the 7th QRMC sought to achieve with a new table (compare the “Current” lines in Table 5 with the “7th QRMC Proposal” lines in Table 4). That is, if the QRMC panel thought that promotions ought to account for about 55 percent of pay increases during a 20-year career, it should have been satisfied with the

TABLE 5. INCREASES IN TOTAL REGULAR MILITARY COMPENSATION ATTRIBUTABLE TO PROMOTIONS, OVER SELECTED PERIODS OF TYPICAL CAREERS, COMPARED WITH INCREASES FROM PROMOTIONS AND LONGEVITY COMBINED (In percent)

Pay Table	Years of Service		
	0 to 20	4 to 20	10 to 20
Enlisted			
Current	59.7	62.9	59.0
7th QRMC Proposal	65.1	68.2	66.4
Officer			
Current	54.5	44.9	41.1
7th QRMC Proposal	62.9	53.3	54.1

SOURCE: Congressional Budget Office. Promotion timings are based on data in Department of Defense, *Report of the Seventh Quadrennial Review of Military Compensation* (August 21, 1992).

NOTE: Excludes annual across-the-board raises. Regular military compensation includes basic pay, basic allowance for subsistence, basic allowance for quarters, variable housing allowance, and the tax advantage that accrues because the allowances are not subject to federal income tax. Allowances are assumed to be paid in cash rather than in kind and are calculated at the with-dependents rates. Data shown for the 7th QRMC table include current (1995) allowances, and the table was inflated to 1995 pay levels.

existing pay and allowances.³ Of course, accounting for allowances raises the apparent reward for promotion under the QRMC's proposed table as well, but presumably there is some point at which the role of longevity becomes too small. The proposed table would attach nearly two-thirds of total pay increases to promotions.

How should promotion and longevity weigh in determining pay? The 7th QRMC acknowledged that "a critic might argue that there is no *right* balance," but judged that "the basic pay table ought to reward promotion at a minimum *more than* the current 50/50 ratio relative to longevity."⁴ Viewed in relation to that standard, the current pay system—basic pay and allowances—would seem to be adequate.

3. The report of the 7th QRMC does not explain why the panel chose to examine the pay table in isolation rather than with allowances incorporated, except to note: "As the largest and most visible element of cash compensation, the basic pay table therefore should provide the member a stable and predictable basis for his or her career decisions." Department of Defense, *Report of the Seventh Quadrennial Review of Military Compensation—Basic Pay: A Strategy for Rewarding Promotion over Longevity*, Major Topical Summary 2 (August 1992), p. 2-1.

4. *Ibid.*, p. 3-3.

chapter, it seems to ask the wrong question; more important than the relative effects of promotion and longevity is whether the system pays people who are promoted rapidly much more than those who are promoted slowly. Second, longevity raises are closely tied to the promotion process. In every grade, longevity raises cease after some point, generally based on the time at which typical members would be promoted from that grade. In addition, if longevity raises are larger in absolute terms in the higher pay grades—as is generally the case with the current pay table—then a portion of those raises might more appropriately be attributed to promotion. Unfortunately, there is no satisfying way to make that attribution, so the most that can be said is that available comparisons of the effects of promotion and longevity on earnings are probably somewhat misleading.

CHAPTER V

PAY AND THE SPEED OF PROMOTION

The approach of the Seventh Quadrennial Review of Military Compensation in examining the rewards for performance under alternative pay tables may not be the most appropriate. The promotion-versus-longevity comparison suggests that members ask themselves, "Over the course of my career, how much of my increase in pay will come automatically and how much because I work hard for promotion?" A more reasonable question would be, "If I work hard and rise rapidly, will I be paid much more than if I take it easy?" That is, does the pay system reward those who are promoted ahead of their peers and penalize those who are promoted more slowly or who fail to be promoted after some point? Among the criteria that the 7th QRMC listed for judging a proposed pay table, the first (and presumably most important) was that it should provide such pay differences. In its analysis, however, the group focused on promotion and longevity comparisons.

FAST VERSUS SLOW PROMOTION

Measured against the standard of rewarding rapid promotion, neither the current pay table nor the 7th QRMC's alternative seems very impressive (see Table 6). Under either pay table, "fast-track" enlisted personnel receive about 9 percent more in total regular military compensation over a 20-year career than their counterparts who are promoted at the average time for each grade. For officers, the variation in timing of promotions is so small that the pay system can offer very little monetary reward for rapid promotion. The penalties for slow promotion are somewhat greater than the rewards for rapid promotion, reflecting the assumption that people promoted slowly cannot expect to advance beyond the grade of E-6 in the enlisted ranks and O-4 in the officer ranks. That effect of lost promotions is most evident for 10 to 20 years of service.

The pay table proposed by the 7th QRMC offers scant improvement over the current table in rewarding rapid promotion.¹ This may mean that the disruption and costs involved in changing to the 7th QRMC's pay table may not be worth the gain. It may also indicate that the comparison of promotion and longevity raises, the

1. The 7th QRMC reported the changes in career pay for enlisted personnel promoted at fast, slow, and average rates that would come from their proposed pay table, and calculated but did not report them for officers. The enlisted results show barely discernible differences. The QRMC also calculated retention effects, which are small but not inconsequential. Unfortunately, the retention results may have been affected by the slight increase in average pay under the QRMC's proposed table, which apparently arose as modifications were made to the original cost-neutral proposal.

primary measure used by the QRMC, does not provide an adequate guide to how well the pay system rewards performance.

Neither the current pay table nor the table proposed by the 7th QRMC offers much scope for increasing the pay differentials among people promoted slowly, at average rates, or rapidly. Those differentials are determined, for the most part, by the variation in promotion timing among the groups and by the differences in average pay levels between pay grades. To have a major effect on the monetary incentives provided by the pay system as it is currently structured would require either enlarging intergrade pay differences or speeding up the promotions of superior performers. By accepting the current structure, the 7th QRMC limited its ability to effect significant change.

TABLE 6. DIFFERENCE IN TOTAL REGULAR MILITARY COMPENSATION FOR SLOW AND FAST PROMOTION COMPARED WITH AVERAGE PROMOTION TIMING (In percent)

Pay Table	0 to 20 Years of Service		10 to 20 Years of Service	
	Slow Promotion	Fast Promotion	Slow Promotion	Fast Promotion
Enlisted				
Current	-9.8	8.6	-11.2	9.3
7th QRMC Proposal	-10.3	8.7	-11.7	9.8
Officer				
Current	-3.7	1.0	-6.2	0.9
7th QRMC Proposal	-4.1	1.5	-6.8	1.3

SOURCE: Congressional Budget Office. Promotion timings are based on data in Department of Defense, *Report of the Seventh Quadrennial Review of Military Compensation* (August 21, 1992).

NOTES: Regular military compensation consists of basic pay, basic allowance for subsistence, basic allowance for quarters, variable housing allowance, and the tax advantage that accrues because the allowances are not subject to federal income tax. Allowances are at the with-dependents rate. Data shown for the 7th QRMC table include current (1995) allowances.

Timing data for the slow-promotion results were modified to reflect no promotion beyond grades E-6 and O-4. Enlisted timing is for the Army; officer timing for average promotion is based on guidelines under the Defense Officer Personnel Management Act.

The data are based on total pay over the indicated periods rather than present values at the start of each period, as might seem more appropriate. Discounting the pay streams reduces the rewards for rapid promotion (or the penalties for slow promotion) very slightly and has virtually no effect on the comparison of the two pay tables.

RETIRED PAY AND THE REWARDS FOR PROMOTION

The military retirement system significantly increases the monetary incentive for service members to seek a final promotion in the years before they retire, potentially affecting their performance well before that promotion. The retirement system effectively lengthens the period during which a member will be rewarded for a promotion, adding to the reward, both absolutely and as a percentage of lifetime earnings including retired pay. Because the service time required for retirement is only 20 years, and retired pay begins as soon as the member leaves the military, retired pay can provide a significant monetary incentive for members to work hard (and to remain in the military) through a major part of their careers.

The effect of retired pay on promotion incentives can be illustrated by the situation facing typical officer and enlisted members who have just completed their 10th year of service, at which point the effects of the up-or-out system begin to wane. The officer will have just been promoted to major or lieutenant commander (O-4), under the guidelines of the Defense Officer Personnel Management Act, and may be promoted once more, at about 16 years of service, before becoming eligible for retirement. The enlisted member will have recently been promoted to E-6 and can hope for a further promotion at about 14 years of service. (He or she may hope to reach grade E-8 before completing 20 years, but this analysis ignores that possibility.) Neither would face mandatory separation before 20 years of service under the current up-or-out rules of any of the services. Note, finally, that this example is different from the slow-versus-normal paths of promotion examined above because it isolates the effect of a single promotion.

The last promotion would add about \$35,000 to the total earnings of a typical officer during the period from 10 to 20 years of service and about \$21,000 to the earnings of an enlisted member. Discounting those increments to the 10-year point to reflect people's preference for current rather than future income results in estimates of about \$14,000 for the officer and \$10,000 for the enlisted member, or 3.7 percent and 4.7 percent of total discounted earnings, respectively (see Table 7).² That is, the officer would accept an immediate payment of \$14,000 at 10 years of service in lieu of an assured promotion six years later, considering only earnings during the next 10 years and ignoring such factors as status, job assignments, and possible future promotions if he or she stayed beyond 20 years of service.

2. The discounting is important in this case because retired pay does not begin until 10 years later and continues for such a long period. The figures are based on a 12 percent real discount rate, which is in the range of estimated rates developed for the examination of the military retirement system by the 5th QRM. See Matthew Black, "Personal Discount Rates: Estimates for the Military Population," in Department of Defense, *Fifth Quadrennial Review of Military Compensation*, vol. IB, *Supporting Appendixes to Uniformed Services Retirement System* (January 1984), Appendix I.

TABLE 7. PRESENT DISCOUNTED VALUE OF FUTURE REGULAR MILITARY COMPENSATION AND RETIRED PAY AT 10 YEARS OF SERVICE WITH AND WITHOUT SUBSEQUENT PROMOTION (In thousands of dollars)

	Enlisted			Officer		
	RMC	Retired Pay	Total	RMC	Retired Pay	Total
With Promotion	213	36	249	381	76	457
Without Promotion	203	31	234	367	66	433
Difference (In percent)	-4.7	-12.4	-5.8	-3.7	-13.5	-5.3

SOURCE: Congressional Budget Office.

NOTES: RMC = regular military compensation.

Enlisted member is an E-6 with possible promotion at 13 years, 10 months of service. Officer is an O-4 with possible promotion at 16 years.

All amounts are discounted at a real rate of 12 percent and assume the member retires after 20 years of service.

Retired pay totals are expected present values, based on average death rates for enlisted and officer retirees. The probability of death before retirement is assumed to be zero.

The promotion would add about \$10,000 to the discounted present value of the officer's retired pay (again discounted to the 10-year point) and about \$4,500 to the present value of retired pay for the enlisted member.³ Those increases are much larger as a percentage of total retired pay than are the percentage increases in regular military compensation. The difference in retired pay between pay grades is felt throughout the retirement period, but the difference in RMC applies only to the post-promotion portion of the period from 10 to 20 years of service.

Adding retired pay to current RMC increases the effect of the last promotion. For the typical officer, the promotion raises lifetime earnings from military service by 5.3 percent, an increase of nearly one-half over the effect of the promotion on RMC alone. The increase for the enlisted member is more modest because the proportional size of the promotion raise is smaller than for the officer and because basic pay, on which retired pay is based, makes up a smaller fraction of RMC for an enlisted member.

Is the combined reward of military pay and retirement benefits sufficient to induce the typical member at midcareer to seek another promotion? That question

3. The absolute amount contributed by retired pay may seem small in comparison with 10 years of RMC. In part, this is a result of discounting; a payment 10 years in the future is diminished in value by two-thirds when discounted at a 12 percent rate, and retired pay only *begins* after 10 years. In addition, the amount of retired pay that a member who leaves after 20 years receives, although 50 percent of his or her final basic pay, is less than 40 percent of final RMC.

cannot be answered without a much more thorough analysis. Still, for someone at the 10-year point, the discounted return amounts to more than five months' pay and allowances—even more if members do not discount future income so heavily.

CHAPTER VI

IS MILITARY PAY TOO COMPRESSED?

Some observers of the military pay system have complained that the pay profile—the pattern followed by a member's pay over the course of a military career—is too flat. That is, they worry that pay does not rise fast enough as a member gains experience and progresses through the ranks.

If the pay system does not provide sufficient performance incentives, pay compression could certainly be one reason for the lack. Other things being equal, the differences in pay between successive grades strictly limit the importance that promotions can have in determining pay, either in comparison with longevity or between people promoted at different speeds. Pay compression could also be to blame if the services were able to attract well-qualified people but could not retain them. Pay growth that is too slow over the span of a typical career could lead good people to seek higher pay in the civilian sector.

Although performance and retention are the appropriate indicators of whether pay compression is a problem, compression is often looked at directly. That reflects the difficulty both of measuring performance and of assessing the desirability of any substantial changes in incentives for retention. Different services have different retention goals, so there may be no best pattern of pay over a military career. In addition, the desirability of most large changes from the current pattern is hard to assess, as models of retention behavior deal only with marginal changes and the services are accustomed to thinking of their current retention rates as at least roughly correct.

Lacking any direct measure of performance or clear evidence of inappropriate retention, observers of the military pay system who worry about pay compression commonly resort to comparisons of current military pay with pay either in the civilian sector or in the military at some time in the past.

MILITARY AND CIVILIAN PAY PROFILES

Comparisons of military and civilian pay profiles can indicate generally whether the structure of the military pay table and associated allowances is roughly appropriate. They cannot, however, support any firm conclusions because there are good reasons—discussed below—that pay growth in the military should be either slower or faster than for apparently comparable workers in the civilian economy. Such

comparisons also cannot justify judgments about the general adequacy of military pay—those judgments must involve an assessment of how well military pay serves the needs of the services.

The growth in pay that a typical member of the military would experience over the course of a career is roughly comparable to the pattern of earnings by age for similarly educated workers in the civilian economy whose earnings are at the 75th percentile for their education group (see Figure 3). The most notable divergences occur late in a military career, when the services promote to grade O-6 in the officer ranks (roughly age 45) and to E-9 (age 40) in the enlisted ranks. Relatively few members achieve those grades.

For officers, whose promotions are infrequent, the growth in pay is somewhat erratic. Officers' pay rises at about the same rate as that of their civilian counterparts during the early years of service, then languishes for six years or more as they wait for their promotion to major or lieutenant commander (shown in Figure 3 at 10 years of service—about age 33—but often one or two years later). As they reach eligibility for retirement at about age 43, officers who have been promoted to lieutenant colonel or commander are again being paid at about the 75th percentile for civilian college graduates.

The pay profiles of typical enlisted personnel and their civilian counterparts correspond closely. Enlisted pay rises somewhat more slowly in the early years of service than the pay of high school graduates in the civilian economy, but for those who are promoted to grade E-7 (shown in Figure 3 at about 14 years of service—age 33) that difference is erased.

One important limitation of the earnings comparisons deserves note. The profiles of civilian earnings only approximate what people at any given age can expect, on average, in the future. The civilian data come from a cross section of workers' earnings in 1992 and 1993. The earnings of any specific age group of those workers may be affected by factors that a younger group will not face at that age. For example, the earnings of workers in their 30s and 40s may be depressed because they belong to the large baby-boom cohorts; hence, younger workers might reasonably expect faster growth of earnings than the cross-sectional profiles indicate.

Faster or Slower Pay Growth May Be Appropriate

Two factors support the argument for a military pay profile that differs substantially from that of comparably educated workers in the civilian economy, although the factors operate in opposite directions. On the one hand, relatively high entry pay (and thus a flat profile in the following years) may be necessary to attract the