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Abstract

We present a synthesis of academic research on corporate payout policy grounded in the pioneering contributions of Lintner (1956) and Miller and Modigliani (1961). We conclude that a simple asymmetric information framework that emphasizes the need to distribute FCF and that embeds agency costs (as in Jensen (1986)) and security valuation problems (as in Myers and Majluf (1984)) does a good job of explaining the main features of observed payout policies — i.e., the massive size of corporate payouts, their timing and, to a lesser degree, their (dividend versus stock repurchase) form. We also conclude that managerial signaling motives, clientele demands, tax deferral benefits, investors’ behavioral heuristics, and investor sentiment have at best minor influences on payout policy, but that behavioral biases at the managerial level (e.g., over-confidence) and the idiosyncratic preferences of controlling stockholders plausibly have a first-order impact.
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“Do you know the only thing that gives me pleasure?  
It’s to see my dividends coming in.”

John D. Rockefeller

A comprehensive theory of payout policy must explain “how much, when, and how,” that is (i) the overall value of payouts over the life of the enterprise, (ii) the time profile of a firm’s payouts across periods, and (iii) the form of those payouts, e.g., the mix of regular dividends versus stock repurchases. We present a synthesis of the academic research on payout policy that is grounded in the pioneering contributions of Lintner (1956) and Miller and Modigliani (1961), and that gauges the extent to which the post-MM literature provides an empirically descriptive theory of payout policy on these three dimensions. Our bottom line is considerably more optimistic than the conclusion of Black (1976) — that the academic literature contains no credible explanation for why firms pay any dividends at all, much less does it explain the massive amounts that real-world firms pay year after year — in his famous “dividend puzzle” discussion some 30 years ago. In contrast, we conclude that today theory does a reasonable job of explaining the
broad brush features of corporate payout policies. Nonetheless, some important gaps remain. And so, while our emphasis is to clarify “what we know” about payout policy, along the way we identify a number of interesting unresolved questions for future research.

We organize the discussion around a simple asymmetric information-based theoretical framework that moves beyond MM (1961) to determine optimal payout policy as a time-varying trade-off of the security valuation problems in Myers and Majluf (1984), which encourage retention, versus the agency costs of free cash flow (FCF) in Jensen (1986), which encourage payouts. The latter two path-breaking studies trail only Jensen and Meckling (1976) in terms of their importance to the post-MM (1958, 1961) corporate finance literature; thus, they provide solid building blocks for a theory that can explain the main features of real-world payout policies including, e.g., why payouts become increasingly likely (and retention less so) over the corporate lifecycle. The foundation of this framework is the need to distribute FCF to make investors as well off as possible — a principle that drives optimal payout policies even in the absence of frictions, but whose fundamental importance only became clear with Jensen’s (1986) analysis of the stockholder welfare consequences of managerial failures to distribute full value.

While the overall value of payouts is the primary concern in the theoretical hierarchy, payout timing is a close second because the time profile of payouts determines the resources available to managers at each point in the firm’s lifecycle, and access to capital determines how much value managers actually generate (as opposed to waste or personally appropriate), as well as how much they ultimately distribute to investors. The dividend versus stock repurchase decision, which is irrelevant in the absence of frictions, obviously matters when dividends are taxed more heavily than repurchases, but arguably is otherwise of subordinated importance because the choice of how to distribute a given amount of cash has only nuanced effects on potential wealth transfers across investors, and on the firm’s ability to raise equity. The available evidence, which we discuss in detail, supports the view that the need to distribute FCF is a first-order determinant of the
overall value and timing of payouts insofar as (i) aggregate earnings, dividends, and stock repurchases are massive, (ii) earnings and payouts are strongly positively correlated, both in time series and in cross-section, and (iii) while not universally the case, payouts tend to occur during the mature phase of the corporate lifecycle, when successful firms generate substantial FCF.

The literature has advanced several other theoretical influences on payout decisions in addition to asymmetric information-induced agency and security valuation costs, most notably managerial use of payouts to signal attributes of future earnings to relatively uninformed outside investors, individuals' behavioral biases that lead to sentiment-based demands for distributions, the desire of large block stockholders to maintain corporate control, clientele effects due, e.g., to heterogeneous personal tax rates on ordinary income and capital gains, and personal tax incentives to defer payouts. We discuss all of these potential influences on corporate payout policy and, while we obviously cannot detail all our findings in this brief introduction, we do want to highlight four of our more important “carry-away” points here. The sections that follow our initial theoretical development and overview of extant empirical evidence provide more detailed theoretical arguments to support these and our other conclusions, as well as discussions of the relevant evidence and, where applicable, suggestions for future research.

First, the literature's focus on whether repurchases will (or should) drive out dividends is misplaced because it implicitly assumes that a single payout vehicle is optimal. Given material information asymmetries across managers and investors and the agency costs they engender, optimal payout policies have both transitory and permanent components so that managers can tailor the total payout to reflect transitory and permanent shocks to earnings and investment opportunities. Having two distinct payout vehicles enables managers to delineate more clearly for investors the strength of their commitment to ongoing payouts. Hence, agency costs imply that the transitory and permanent components of payout policy are complements, not substitutes as are dividends and repurchases in the standard frictionless model. Historically, firms paid regular and special dividends to distinguish permanent
from transitory payouts, and now they pay regulars and repurchase stock. There is every reason to expect the permanent component to survive, whatever the label.

Second, extant empirical evidence is strongly incompatible with the notion that the primary purpose of dividends is to signal managers’ views of future earnings to outside investors. For example, knowledge of the fact that a firm has increased its dividend generally does little to improve forecasts of future earnings over and above what outsiders can infer from current earnings. Moreover, the scale of dividend payments is too large and the growth therein is too stable to be plausibly explained by signaling motives, which presumably operate only intermittently at any given firm. Finally, most payouts are made by established firms that arguably have an easier time communicating directly with investors than do the young firms that pay few or no dividends — i.e., if signaling motives are pervasive, then the wrong firms are doing the signaling. The fact that most distributions are made by mature firms is instead readily explained by the observation that such firms generate substantial FCF that must be distributed rather than reinvested to maximize investor welfare, while growth firms’ investment opportunities markedly outstrip their internally generated cash flows, making retention optimal.

Third, over-confidence on the part of managers (Roll 1986; Heaton 2002, Malmendier and Tate 2005, Ben-David et al. 2007) is potentially a first-order determinant of payout policy because it induces them to over-retain resources to invest in dubious projects and so behavioral biases may, in fact, turn out to be more important than agency costs in explaining why investors pressure firms to accelerate payouts. Behavioral influences on individual investors — e.g., heuristic decision rules such as “consume only out of dividends” (Shefrin and Statman 1984) or investor sentiment for dividends (Baker and Wurgler 2004b) — plausibly affect the demand for dividends by some individuals, but add little or no explanatory power at the firm or aggregate level. Most obviously, the real value of aggregate dividends has almost inexorably increased year after year in modern times, despite the ostensible ebb and flow of investor sentiment for dividends. Moreover, no evidence supports the view that firms cut their dividends when investor
1.1 Before Lintner, There Was Alfred P. Sloan, Jr.

Lintner (1956) is widely viewed as the genesis of modern academic empirical research on dividend policy. Yet before Lintner, there was Alfred P. Sloan, Jr., the legendary chairman of General Motors, who is widely credited with developing many of the practices and features of corporate organizations that we now take for granted. In a remarkably insightful interview published in the September 12, 1935 issue of The New York Times ("Sloan Explains Dividend Policy"), Sloan

sentiment for dividends wanes rather, as Lintner (1956) and many others document, managers rarely cut the dividends of firms that are not unambiguously in financial distress. On the other hand, investors’ behavioral biases plausibly have a detectable impact on the payout policies of a subset of firms — those with controlling or strongly influential stockholders.

Fourth, the influence of controlling stockholders on payout policy — particularly in non-US firms, where controlling stockholders are common — is a promising area for future research. Most models, including the one we emphasize here, rely on the Fisher Separation Theorem: independent of their specific utility functions, all investors want managers to adopt value-maximizing policies. Value-maximization is the appropriate corporate objective because competitive markets enable investors to convert their maximized wealth into utility-maximizing portfolios of consumption over time and across states of nature. Controlling stockholders may prefer non-value-maximizing policies because the time and risk profile of payouts under value maximization has unattractive consumption attributes given their utility functions, and the portfolio trades needed to offset those attributes would weaken their hold on control. In this case, the firm’s optimal payout and investment decisions are now jointly determined with the optimal portfolio decisions of the controlling party. Taking this interdependence into account yields interesting new implications for payout policy, especially for family-controlled firms whose aging founders and multiple generations of heirs exhibit heterogeneous consumption and risk preferences.
Introduction
delineates the key principles that GM’s board applied when setting dividend policy:

“The directors of General Motors have consistently taken the position that there should be only two considerations in determining dividend action — first, earnings, which alone make dividends possible, present as well as future; second, the future (capital) needs of the business . . .”

“... it is usually not either desirable or even possible over the years to pass out all the earnings of a business; some should be set aside for”. . . capital expenditures, working capital increases, etc. “On the other hand, conditions do arise where it is entirely justifiable . . . to pay out in any one year more than that year’s earnings.” For example, “. . . a reduced volume of business releases working capital which can be made available to the stockholders for their use.”

“. . . the problem of dividend policy is not always a simple one. A rate of dividend when once declared carries with it the desirability of continuity. The declaration must reflect not only the current condition of the business but there must be considered the future trend, especially with respect to prospective earnings and possible capital needs.”

“The most important point I want to make is that General Motors stockholders can rely upon the directors to pass on the largest possible share of the earnings consistent with the needs of the business.” (emphasis added in all quotes).

Sloan’s intuitive discussion of GM’s dividend policy to a large degree captures principles that were later codified in modern finance theory, and that form the foundation for the current synthesis. Sloan recognizes that earnings and capital expenditures — which jointly determine FCF — are critical determinants of payout policy. He describes (i) the importance of retention to fund attractive investments and of payouts
to distribute excess cash, (ii) the desirability of avoiding dividend reductions, and (iii) the need to forecast earnings and capital requirements when making payout/retention decisions. He also promises that GM’s board will provide stockholders with the greatest payouts possible, after retaining sufficient cash to cover the future capital requirements of the business. And so, while his terminology differs slightly, Sloan identifies as GM’s objective exactly what modern theory says that stockholders want the board to do — distribute the full present value of the FCF generated by investment policy.

1.2 Steve Ballmer and Bill Gates on Payout Policy

The same central focus on the distribution of FCF is echoed in the payout policy views of Steve Ballmer and Bill Gates, individuals whose influence in the business community today surely matches and arguably exceeds that of Sloan in his day. The appendix contains excerpts from a teleconference that Ballmer, Gates, and two other top executives of Microsoft held with Wall Street analysts to explain the firm’s July 2004 announcement of plans to distribute $75 billion to stockholders over the next four years. The firm had decided to distribute so much cash because many of its legal uncertainties had recently been resolved, so that its previous strategy of stockpiling cash to satisfy possible adverse legal judgments was no longer appropriate.

In the conference call, the philosophy behind Microsoft’s payout policy was described by John Connors, the firm’s Chief Financial Officer:

“What I thought I’d do is just share the philosophies and the priorities that were the foundation for our action today. As Steve has mentioned and Bill will talk about in a moment, we will continue to invest very heavily. . . .

So starting from that point, our first priority for our cash management plan is to continue to grow our regular dividend. . . .

Our second priority is to increase our plans to repurchase our stock. Under the action approved by the board
earlier today, we plan to repurchase up to $30 billion of our stock over the next four years.

After considering those two steps, our projected capital needs and reviewing the resolution of so much of our legal uncertainty, we believe there is additional cash that can be returned to shareholders in the near term. As a result, we will be making a $3 per share, one-time special dividend.

We will have a substantial balance sheet on an ongoing basis, provided our business performs well, which we expect it to, and there’s a variety of things that that cash is available for. First of all, it’s available for acquisitions. Secondly, it’s available for opportunistic investments. And then finally, I think that we will also be a company that is relatively conservative in keeping enough financial resources available for any unforeseen circumstances we might see.”

In sum, Microsoft first estimated its need for cash to fund profitable investment, including the maintenance of an ample cash reservoir to fund imperfectly anticipated opportunities. It then calculated how much cash to distribute to stockholders based on its current cash position and its probable future cash flows — again, a policy that conforms to the central principle of modern theory, namely that optimal payout policies distribute the full present value of the FCF generated by investment policy. The appendix also includes discussion by Microsoft’s executives of a number of issues that we analyze more generally in this synthesis, including:

- The overall scale of payouts to stockholders.
- Retention to meet capital investment needs.
- The determinants of transitory versus permanent distributions.
- Whether the decision to distribute large amounts of cash implies that Microsoft is now a mature firm with more limited investment opportunities.
1.3 Organization of the Discussion

We begin in Section 2 with a brief discussion of the frictionless Fisherian model and, specifically, of the variant thereof employed by MM (1961) to establish their path-breaking dividend irrelevance theorem. In Section 3, we track the steps needed to move from the basic MM model to an asymmetric information-driven theory in which security valuation problems and agency costs jointly determine the present value and timing of payouts over the corporate lifecycle, and which explains the main stylized facts about payout policy. Section 4 describes the scale and concentration of corporate payouts and earnings, and the expanded role for stock repurchases in recent years. Section 5 discusses the empirical linkage between corporate earnings and payouts, and relates that evidence to the implications of our asymmetric information framework. Section 6 considers the evidence on the “disappearing dividends” trend identified by Fama and French (2001), while Section 7 discusses why dividends survive despite the personal tax and other advantages of stock repurchases. Sections 8–13 discuss signaling, behavioral influences on payout policy, clientele effects, controlling stockholders, taxes, and stock repurchases, respectively. Section 14 summarizes our conclusions and reiterates some important unanswered questions about payout policy.


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