

Distributed Leadership, Organisational Commitment and Job Satisfaction among Public Secondary School Teachers: Survey Evidence from Lahore, Pakistan

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ABSTRACT

Distributed leadership has become one of the most widely endorsed ideas in school leadership scholarship, yet the empirical base supporting its claimed effects on teacher attitudes remains concentrated in Western and East Asian systems whose governance arrangements differ sharply from those of South Asia. This study examines how teachers in Pakistani public secondary schools perceive the distribution of leadership in their schools, and how those perceptions relate to organisational commitment and job satisfaction. A cross-sectional survey was administered to 300 secondary school teachers (149 men, 151 women; 95.2% response) drawn from 65 randomly selected government secondary schools in district Lahore. The instrument combined items from two established distributed leadership inventories across five dimensions including school leader behaviour, shared vision, values and beliefs, collaboration and cooperation, and decision making alongside affective commitment and job satisfaction scales (48 items; $\alpha = .79-.91$). Teachers reported moderate to strong perceptions of distributed leadership ($M = 3.47$, $SD = 0.77$ on a five-point scale), with collaboration and cooperation rated highest and values and beliefs lowest. Perceived distribution of leadership was strongly associated with commitment ($r = .615$) and with job satisfaction ($r = .719$), and accounted for 37.8% and 51.7% of their variance respectively. Gender differences were negligible throughout (all $d < 0.20$). The findings support the transferability of distributed leadership effects to a highly centralised, examination-driven system, but also expose a distinctive pattern: participation in decisions is experienced as available while collective professional standards and relational recognition are not. Implications for school leadership development in Punjab are discussed alongside the methodological limits of single-source cross-sectional designs.

Keywords: Distributed Leadership; Organisational Commitment; Job Satisfaction; Secondary Schools; Pakistan; Teacher Perceptions

INTRODUCTION

Few propositions in contemporary school leadership research have travelled as quickly, or as uncritically, as the claim that leadership is more productive when it is distributed. Within a decade of its consolidation as an analytic framework, distributed leadership had moved from a descriptive lens for studying how leadership practice is stretched across people and situations (Spillane et al., 2001) to a normative prescription embedded in national leadership development programmes. That trajectory has attracted its own critique. Tian et al. (2016) demonstrate that the literature between 2002 and 2013 repeatedly conflated distributed leadership as a descriptive account of practice with distributed leadership as a recipe for improvement, while Lumby (2016) argues that its rapid diffusion owes as much to institutional fashion as to accumulated evidence. Spillane and Healey (2010) put the methodological objection most directly: the

field has moved toward causal claims before settling the study operations and measures on which such claims depend.

These reservations matter more, not less, when the framework is exported. The strongest empirical evidence connecting distributed leadership to teacher attitudes comes from Flemish secondary schools (Hulpia et al., 2009b; Hulpia, Devos, & Van Keer, 2011), from Singapore and the United States (Torres, 2018, 2019), and from cross-national teacher surveys dominated by OECD systems (Sun & Xia, 2018). Each of these settings grants schools substantial discretion over staffing, curriculum enactment and resource allocation. Pakistani public secondary schools do not. Teacher recruitment, transfer, promotion and curriculum are administered through provincial bureaucracies; head teachers exercise limited formal authority over the levers that leadership distribution is usually assumed to redistribute. If distributed leadership is partly an artefact of decentralised governance, its associations with teacher attitudes should attenuate in such a system. If instead those associations reflect something more elementary about professional working relationships being consulted, being trusted, being able to act on one's own judgement in the classroom they should persist.

The Pakistani evidence to date is suggestive but thin. Salfi (2011), surveying 351 head teachers and 702 teachers across Punjab, found that successful head teachers built shared vision and cultivated cultures of collaboration and trust, but did not examine teacher attitudinal outcomes. Comparable work from Bangladesh reports that distributed practice coexists uneasily with entrenched hierarchy and resource scarcity (Salahuddin, 2012). What is missing is a quantitative account that measures teachers' perceptions of leadership distribution directly and tests their association with the attitudes most consequential for school stability: organisational commitment and job satisfaction. Teacher attrition, absenteeism and disengagement are persistent problems in Punjab's government schools, and if perceived leadership distribution accounts for meaningful variance in commitment and satisfaction, it becomes a lever that head teachers can pull without waiting for structural reform.

This study therefore asks three questions. First, to what extent do teachers in Lahore's public secondary schools perceive leadership as distributed, and how does that perception vary across the constituent dimensions of the construct? Second, are perceptions of distributed leadership, commitment and satisfaction patterned by teacher gender in a system where schools are single-sex and separately administered? Third, how strongly is perceived distributed leadership associated with teachers' organisational commitment and job satisfaction, and does it predict one more powerfully than the other?

CONCEPTUAL FRAMEWORK

From the heroic head to leadership as practice

The intellectual appeal of distributed leadership rests on a dissatisfaction rather than a discovery. Decades of school effectiveness research established that leadership matters for school outcomes (Leithwood et al., 2004), but attributed that influence to the individual principal in ways that fitted poorly with what leadership actually looks like inside schools. Elmore (2000) argued that the expectation of a single instructional leader was structurally incoherent in institutions where teaching is conducted behind closed doors by many autonomous professionals. Gronn (2002) reframed leadership as concertive action arising from conjoint agency, and Spillane et al. (2001) relocated the unit of analysis from the leader to leadership practice as it is stretched over leaders, followers and the situation.

An important consequence, frequently lost in policy translation, is that distributed leadership is not delegation. Harris (2005) is explicit that distributing leadership does not render the head teacher superfluous; the head remains decisive in creating the conditions — trust, structures for collaboration, protected time — under which collective leadership becomes possible. Bolden's (2011) review across

organisational settings reaches a similar judgement while warning that the term has come to absorb any arrangement that is not conventionally hierarchical, a conceptual elasticity that Bennett et al. (2003) had already identified in the first systematic desk review. The construct's breadth is precisely why measurement decisions carry so much weight, and why Hairon and Goh (2015) question whether the field has converged on a defensible operationalisation at all.

The unresolved tension running beneath this literature is between two incompatible uses of the same term. Spillane (2005) proposed distribution as an analytic frame: a way of seeing leadership practice that makes no claim about whether such practice is good. Harris (2005) and much of the improvement literature use it prescriptively, as an arrangement schools ought to adopt. The slippage is consequential for empirical work, because a descriptive frame implies that every school has distributed leadership in some configuration and the research question concerns its shape, whereas a prescriptive frame implies that schools have more or less of it and the research question concerns its quantity. Survey instruments — including the one used here — necessarily adopt the second position, converting a relational and situated phenomenon into a quantity that individual teachers can rate. That conversion buys statistical tractability at the cost of exactly what the distributed perspective was originally formulated to capture. Findings from such instruments are therefore best understood as evidence about teachers' *perceptions of the availability* of participative practice, not about how leadership is in fact stretched across a school.

Why leadership distribution might shape commitment and satisfaction

The mechanism most commonly proposed is exchange-based. Where teachers participate in decisions affecting their work, are consulted about school direction and receive recognition from formal leaders, they interpret the organisation as investing in them and reciprocate with attachment and effort. This reasoning maps closely onto affective commitment as theorised by Meyer and Allen (1991) — an emotional identification with the organisation, distinct from continuance commitment grounded in the costs of leaving. The distinction matters for interpretation: in a labour market where public sector teaching offers security scarce elsewhere, continuance commitment may be high for reasons wholly unrelated to leadership, whereas affective commitment should be responsive to how leadership is experienced.

Empirically, the association is robust but its magnitude is contested. Hulpia et al. (2009b) found that teachers' perceptions of leadership team cooperation and participative decision making predicted both satisfaction and commitment in large Flemish secondary schools, though multilevel analyses subsequently showed that only about 9% of the variance in commitment lay between schools, with the great majority residing within them. Angelle (2010) reports parallel associations with trust and collegiality in a US middle school. Torres (2018, 2019), using large national datasets in Singapore and the United States, finds that the relationship between distributed leadership and satisfaction is substantially mediated by professional collaboration — implying that leadership distribution works through the collegial practices it enables rather than directly. Sun and Xia (2018), analysing TALIS data, add self-efficacy as a further mediator.

Two implications follow for the present study. First, effects estimated from single-source cross-sectional surveys, in which the same teacher reports both leadership perceptions and their own attitudes, should be expected to exceed those from multilevel or multi-informant designs, because common-method variance inflates them (Podsakoff et al., 2003). Second, because the mediating mechanisms are collegial and psychological rather than structural, there is reason to expect the association to survive translation into a centralised system — even where the formal scope for distributing authority is narrow.

The Pakistani context

Government secondary schools in Punjab operate within a hierarchical administrative structure in which head teachers function substantially as implementers of provincial policy. Schools are single-sex, and male and female schools are managed through parallel administrative arrangements, which makes gender a meaningful axis of comparison: differences, if present, would reflect divergent organisational cultures rather than within-school dynamics. Salfi (2011) documented that head teachers associated with school improvement in this system did build shared vision and collaborative cultures, suggesting that distribution occurs informally even where it is not structurally mandated. Whether teachers perceive that distribution, and whether perceiving it is consequential for their attitudes, has not previously been tested quantitatively at scale in this setting.

The present study

Three expectations follow from the foregoing. If distributed leadership shapes teacher attitudes through collegial practice rather than structural devolution, then (H1) teachers' perceptions of leadership distribution should be positively and substantially associated with both organisational commitment and job satisfaction even in a centralised system. If satisfaction is the more proximate evaluative judgement while commitment is the more slowly-forming and structurally overdetermined attachment, then (H2) perceived distribution should account for more variance in satisfaction than in commitment. And because boys' and girls' schools in Punjab operate under parallel provincial administration rather than as internally differentiated environments, (H3) gender differences in all three constructs should be negligible. Each is tested below.

METHOD

Design and participants

The study used a cross-sectional descriptive survey design. The population comprised the 331 public secondary schools of district Lahore. Sixty-five schools (30 boys', 35 girls') were selected by simple random sampling from a sampling frame listing all schools in the district. Within each sampled school, five secondary school teachers who were available and willing to participate were invited, yielding 315 invitations. Three hundred usable questionnaires were returned, a response rate of 95.2%. Table 1 summarises participant characteristics.

Table 1. Participant characteristics (N = 300)

Characteristic	Category	Male n (%)	Female n (%)	Total n (%)
Gender	—	149 (49.7)	151 (50.3)	300 (100)
Academic qualification	Graduation	18 (6.0)	24 (8.0)	42 (14.0)
	Master's	120 (40.0)	113 (37.7)	233 (77.7)
	M.Phil.	11 (3.7)	14 (4.7)	25 (8.3)
Professional qualification	B.Ed.	43 (14.3)	47 (15.7)	90 (30.0)
	M.Ed.	104 (34.7)	97 (32.3)	201 (67.0)
	Other	2 (0.7)	7 (2.3)	9 (3.0)
Locality	Urban	112 (37.3)	120 (40.0)	232 (77.3)
	Rural	37 (12.3)	31 (10.3)	68 (22.7)

The sample was highly qualified — 86% held a master’s degree or above, and 97% held a formal teaching qualification — and predominantly urban, which reflects the composition of Lahore’s government secondary sector but limits generalisation to rural districts.

Instrument

A 48-item questionnaire was constructed by adapting items from two established instruments with the authors’ written permission: Duif’s (2013) *Distributed Leadership in Practice* report and Hulpia’s (2009) Distributed Leadership Inventory. Items were selected to match the study’s five-dimension framework and responses were recorded on a five-point Likert scale (1 = *strongly disagree*, 5 = *strongly agree*). The instrument comprised 27 distributed leadership items across five dimensions — school leader behaviour (9 items), shared vision (3), values and beliefs (4), collaboration and cooperation (6), and decision making (5) — together with 11 organisational commitment items and 10 job satisfaction items. The commitment items (“I feel like part of the family of this school”; “I feel emotionally attached to this school”) index affective rather than continuance commitment in Meyer and Allen’s (1991) terms, a point that bears on interpretation.

The English instrument was translated into Urdu by the researcher with four additional bilingual colleagues to ensure comprehensibility. A pilot study with 40 secondary school teachers established internal consistency (Table 2) and confirmed item clarity; instructions were subsequently revised to include a worked example.

Table 2. Internal consistency of scales (pilot, $n = 40$)

Scale	Items	Cronbach’s α
Full instrument	48	.939
Distributed leadership	27	.911
Organisational commitment	11	.791
Job satisfaction	10	.812

Procedure and ethics

Written applications were submitted to head teachers explaining the study’s purpose, the value of teacher participation, and assurances of confidentiality. The researcher visited each school in person and distributed and collected questionnaires directly. Participation was voluntary; identity and purpose were disclosed at every site; individual and institutional identifiers were withheld from all records; and data collection was conducted with attention to prevailing social norms governing interaction in the Pakistani school context.

Analysis

Data were analysed in SPSS. Item and scale means with standard deviations were computed; mean response values were interpreted against fixed bands (≤ 1.50 = very weak; 1.51–2.50 = weak; 2.51–3.50 = moderate; 3.51–4.50 = strong; > 4.50 = very strong belief). Independent-samples t tests compared male and female teachers across all scales, and Cohen’s d was calculated from reported group means and standard deviations to characterise the magnitude of any differences independently of significance testing. Pearson correlations examined bivariate associations, and simple linear regression estimated the proportion of variance in commitment and in satisfaction attributable to perceived distributed leadership.

RESULTS

Perceived distribution of leadership

Aggregated across its 27 items, distributed leadership was perceived at $M = 3.47$ ($SD = 0.77$) — the upper end of the moderate band, close to the threshold of strong endorsement. The dimension-level picture (Table 3) is more informative than the composite, because the dimensions diverge in ways the aggregate conceals.

Table 3. Distributed leadership dimensions and outcome scales ($N = 300$)

Scale / dimension	Items	M	SD	Highest item (M)	Lowest item (M)
Collaboration and cooperation	6	3.64	0.95	Express opinions regularly (4.07)	Cooperate to achieve collective ambition (3.40)
Decision making	5	3.51	0.84	Everyone involved in decision making (3.77)	Own decisions on professional development (3.22)
School leader behaviour	9	3.49	0.89	Welcomes initiative (3.96)	Supports own decisions in work (3.18)
Shared vision	3	3.43	1.09	Staff take ownership of tasks (3.59)	Common values for all (3.28)
Values and beliefs	4	3.06	1.01	Mutual respect among professionals (3.60)	High standards set for professionals (2.21)
Distributed leadership (overall)	27	3.47	0.77	—	—
Organisational commitment	11	3.56	0.77	Feel part of the family (3.70)	Care about the school's fate (3.37)
Job satisfaction	10	3.42	0.87	Job makes me content (3.94)	HOD treats me with respect (3.10)

Note. Dimension means for the five subscales are weighted composites of the male and female group means reported in Table 4.

Collaboration and cooperation was the most strongly endorsed dimension, driven by the highest-scoring item in the entire instrument: teachers reported expressing their opinions on a regular basis ($M = 4.07$). Sufficient time for collaboration (3.78), knowledge sharing (3.58), mutual problem solving (3.55) and collaborative work toward school results (3.52) all fell in the strong band. Decision making was also endorsed, with general involvement in decisions (3.77) and autonomy over the content of one's work (3.76) rated highly.

Against this, two findings stand out as discrepant. Within the school leader behaviour dimension, the items describing invitation and encouragement scored well — welcoming initiative (3.96), stimulating reflection (3.73), holding high professional expectations (3.63), formally acknowledging teaching ability (3.56) — while the items describing substantive empowerment scored lowest: supplying information that generates new ideas (3.24) and supporting teachers to make their own decisions in their work (3.18). The gap between being invited to contribute and being resourced to act is roughly three-quarters of a scale point.

More striking still, the single lowest-rated item across all 48 was “At our school we set high standards for professionals” ($M = 2.21$, $SD = 1.21$) — the only item in the entire instrument falling in the weak band, and one that sits within an otherwise unremarkable dimension. Its neighbours in that dimension are ordinary:

mutual respect (3.60), confidence in colleagues' abilities (3.29), mistakes treated as learning opportunities (3.18). The isolation of this item is analytically significant and is taken up in the discussion.

Commitment and job satisfaction

Organisational commitment was rated at $M = 3.56$ ($SD = 0.77$), the lower edge of the strong band. Its profile is coherent and affective: teachers reported feeling part of the school's family (3.70), sharing its values (3.69), treating its problems as their own (3.67) and being willing to spend the remainder of their careers there (3.63). The lowest commitment items — pride in belonging (3.49), sentimental attachment (3.44) and caring about the school's fate (3.37) — remain in the moderate band, so the scale shows compression rather than contradiction.

Job satisfaction averaged $M = 3.42$ ($SD = 0.87$), moderate overall and the lowest of the three constructs. The distribution within the scale is instructive. Intrinsic aspects were rated highest: the job produces contentment (3.94), pride (3.57) and inspiration (3.54). Relational and retention-oriented aspects were rated lowest: the work is worthwhile (3.32), the intention to remain in the current post (3.15), and — the lowest item on the scale — liking the job because the head of department treats one with respect (3.10). Teachers, in short, report drawing satisfaction from the work itself considerably more than from how they are treated by those who lead them.

Gender comparisons

Independent-samples t tests were conducted across all five distributed leadership dimensions and both outcome scales (Table 4). Female teachers returned marginally higher means on every scale without exception, but the magnitude of these differences was uniformly trivial.

Table 4. Gender comparisons on all scales

Scale	Male M (SD)	Female M (SD)	t	Cohen's d
School leader behaviour	3.47 (0.887)	3.52 (0.890)	-0.45	0.06
Shared vision	3.42 (1.091)	3.44 (1.085)	-0.11	0.02
Values and beliefs	3.03 (1.028)	3.09 (0.984)	-0.52	0.06
Collaboration and cooperation	3.57 (0.985)	3.71 (0.916)	-1.28	0.15
Decision making	3.45 (0.860)	3.57 (0.824)	-1.26	0.14
Distributed leadership (overall)	3.42 (0.782)	3.50 (0.750)	-0.90	0.10
Organisational commitment	3.51 (0.788)	3.59 (0.748)	-0.96	0.10
Job satisfaction	3.33 (0.898)	3.50 (0.840)	-1.69	0.20

Note. $n = 149$ male, 151 female. Cohen's d computed from the group means and standard deviations reported above.

Every observed difference falls at or below $d = 0.20$, the conventional threshold for a small effect, and six of the eight fall below $d = 0.15$. Interpreted through effect size rather than significance testing alone, the evidence indicates no substantive gender differentiation in how male and female teachers perceive leadership distribution or in how committed and satisfied they report being. The largest of the differences — job satisfaction, $d = 0.20$ — is worth noting as a direction for replication rather than as a finding, since it approaches but does not reach a magnitude that would be visible in practice.

Association between distributed leadership and teacher attitudes

Pearson correlations revealed strong positive associations among all three constructs (Table 5). Perceived distributed leadership correlated with organisational commitment at $r = .615$ and with job satisfaction at $r = .719$; commitment and satisfaction correlated at $r = .696$. All were significant at $p < .001$.

Table 5. Correlations and simple regressions ($N = 300$)

	1	2	3
1. Distributed leadership	—		
2. Organisational commitment	.615***	—	
3. Job satisfaction	.719***	.696***	—

Regression	B	SE	β	t	R²
DL predicting organisational commitment	0.617	0.046	.615	13.46***	.378
DL predicting job satisfaction	0.818	0.046	.719	17.85***	.517

Note. *** $p < .001$. Constants: 1.420 ($SE = 0.163$) for commitment; 0.583 ($SE = 0.163$) for satisfaction. $df = 298$.

Perceived distributed leadership accounted for 37.8% of the variance in organisational commitment and 51.7% of the variance in job satisfaction. The asymmetry is substantial: leadership distribution explains roughly a third more variance in satisfaction than in commitment, and the unstandardised slope is correspondingly steeper (0.818 versus 0.617), meaning that a one-point increase in perceived distribution corresponds to a 0.82-point rise in satisfaction against a 0.62-point rise in commitment.

DISCUSSION

Distribution without standards

The most analytically interesting result is not the strength of the leadership–attitude association but the internal structure of what teachers reported. Participation was rated highly: expressing opinions regularly was the strongest item in the instrument, general involvement in decisions and autonomy over the content of one’s work followed close behind. Yet the belief that the school sets high standards for its professionals attracted the only weak rating in the entire study ($M = 2.21$), and the items describing substantive empowerment — receiving information that enables new ideas, being supported to decide in one’s own work — clustered at the bottom of the school leader behaviour dimension.

The pattern is coherent rather than contradictory. What teachers appear to describe is a school culture in which consultation is genuine and collegial relations are warm, but in which the collective professional expectations that would give consultation its edge are absent. Voice is available; accountability for the quality of what that voice produces is not. This is precisely the configuration that Harris (2005) warned against when insisting that distributed leadership is not delegation and does not dissolve the head teacher’s responsibility for holding the organisation to standards. It also lends empirical weight to Lumby’s (2016) contention that distributed leadership can be adopted as a repertoire of participatory gestures that leaves the underlying distribution of authority and expectation untouched. Bolden (2011) makes the same point from an organisational literature: where the term expands to cover any arrangement that is not overtly hierarchical, it stops discriminating between shared responsibility and diffused responsibility.

Read alongside Salahuddin's (2012) account of Bangladeshi secondary schools — where distributed practice coexists with entrenched hierarchy — and Salfi's (2011) finding that Punjab's more successful head teachers cultivated collaboration and shared vision, a regional pattern becomes visible. In systems where the formal levers of authority sit above the school, head teachers can readily distribute the relational aspects of leadership (consultation, encouragement, collegial time) while lacking either the mandate or the instruments to distribute its evaluative aspects (standard-setting, professional accountability, resource allocation). The result is a leadership configuration that is participative in tone and thin in consequence.

Why satisfaction responds more strongly than commitment

Perceived distributed leadership explained 51.7% of the variance in job satisfaction against 37.8% in commitment. Two interpretations merit consideration.

The first is substantive. Job satisfaction is an evaluative judgement about present working conditions, of which leadership behaviour is a direct and immediate component. Organisational commitment, in Meyer and Allen's (1991) formulation, is a more slowly-forming attachment shaped by tenure, identity and — critically in this context — the alternatives available. Government teaching posts in Punjab offer security and status that are scarce in the wider labour market, so a substantial portion of teachers' attachment to their schools is likely to derive from sources leadership cannot reach. That the commitment scale used here indexes affective rather than continuance commitment does not eliminate the point: affective attachment to a school where one expects to remain for structural reasons will still be partly overdetermined.

The second interpretation is methodological, and the more cautionary of the two. Because leadership perceptions and attitudinal outcomes were reported by the same teacher on the same occasion, common-method variance will have inflated both estimates (Podsakoff et al., 2003), and plausibly inflated the satisfaction estimate more, since satisfaction and leadership evaluation are conceptually proximate and share affective tone. The variance figures reported here are considerably larger than those from multilevel Flemish work, where only about 9% of the variance in commitment lay between schools (Hulpia et al., 2009b, 2011). They are best read as upper bounds.

Even so, the direction and rank ordering of the findings align with the international evidence in a way that is not attributable to method alone. Torres (2018, 2019) similarly reports stronger and more consistent associations between distributed leadership and satisfaction than with other outcomes in Singapore and the United States, and attributes much of the relationship to professional collaboration. The present data are consistent with that mediating account: collaboration and cooperation was both the most strongly endorsed dimension and the one whose items describe exactly the practices Torres identifies as the operative mechanism. The most defensible inference is that distributed leadership operates on teacher attitudes in this Pakistani sample through the collegial practices it enables rather than through any redistribution of formal authority which is also why it survives translation into a system where such redistribution is largely unavailable.

The relational deficit

The lowest-rated job satisfaction item liking the job because the head of department treats one with respect ($M = 3.10$) deserves emphasis because it sits so oddly against the high ratings for consultation and collegiality. Teachers reported drawing satisfaction from the work itself far more than from their treatment by formal leaders, and the intention to remain in the current post (3.15) was correspondingly weak. The dissonance suggests that horizontal relations among teachers are considerably healthier than vertical relations between teachers and heads of department. Given that the strongest predictor of satisfaction in this dataset is a construct largely composed of horizontal practices, this is internally consistent — but it

identifies the head of department relationship as the point at which the system's participatory culture is thinnest, and therefore as the most plausible target for intervention.

The absence of gender effects

Male and female teachers were, on every scale, effectively indistinguishable (all $d \leq 0.20$). This is a more consequential null result than it first appears. Boys' and girls' government secondary schools in Punjab are separately staffed and separately administered, so gender here functions as a proxy for two parallel organisational systems rather than for individual difference within schools. The near-complete convergence of perceptions across those systems suggests that the leadership culture documented in this study participative in tone, weak in standard-setting, thin in vertical recognition is a property of the provincial system rather than of any particular school type. That finding aligns with Salfi's (2011) observation that leadership practices in Punjab's government schools are shaped predominantly by common administrative structures, and it implies that reform directed at head teacher practice would need to operate system-wide rather than sector by sector.

What the Pakistani case contributes to the debate

Taken together, the three hypotheses were supported, but their joint pattern says something the individual tests do not. H1 and H2 held: perceived distribution was substantially associated with both outcomes and explained more variance in satisfaction. H3 held with unusual completeness. Yet the construct that produced these associations turned out, on inspection, to be composed almost entirely of horizontal collegial practice, with its evaluative and empowering components rated weakly or not at all.

This bears on the descriptive-prescriptive tension set out earlier. If distributed leadership survives translation to a system where authority cannot meaningfully be devolved, and if it does so by measuring collegiality, then the strong effects reported across the international literature may rest on a narrower foundation than is usually acknowledged. Torres (2019) reaches the mediation finding from the opposite direction, showing that professional collaboration carries much of the relationship in US schools; the present study suggests that in a centralised system collaboration may not merely mediate the relationship but largely constitute it. This would explain why distributed leadership research reports consistently positive associations with teacher attitudes across otherwise dissimilar systems (Tian et al., 2016) while struggling to demonstrate comparable consistency with student outcomes: the construct may be indexing a general property of healthy professional workplaces rather than a distinctive leadership configuration.

The Pakistani case is useful precisely because it separates variables that are confounded elsewhere. In decentralised systems, collegiality and devolved authority travel together, and instruments cannot distinguish their contributions. Here they came apart high collegiality, negligible devolution, weak standard-setting and the attitudinal associations persisted. That is a limited but genuine piece of evidence that the mechanism is collegial rather than structural, and it recommends that future instruments measure the evaluative and empowering dimensions of distribution separately rather than folding them into a composite that their stronger neighbours dominate.

LIMITATIONS

Four limitations bound these conclusions. First, the design is cross-sectional and correlational; the regression analyses estimate shared variance and cannot establish that leadership distribution causes commitment or satisfaction. Reverse and reciprocal causation are entirely plausible satisfied teachers may perceive their leaders more generously and Spillane and Healey's (2010) caution about advancing to causal inference ahead of adequate study operations applies directly.

Second, all measures derive from a single informant on a single occasion, so common-method variance inflates the reported associations by an unknown but non-trivial margin (Podsakoff et al., 2003). Multi-informant designs incorporating head teacher and departmental data, or repeated measurement, would substantially strengthen future estimates.

Third, teachers are nested within schools, but the analysis treats the 300 respondents as independent observations. With five teachers sampled per school across 65 schools, clustering is certain to be present, and standard errors are consequently underestimated. Multilevel modelling would be the appropriate treatment and would also permit separation of within-school from between-school variance the distinction that proved decisive in the Flemish work.

Fourth, the sample is confined to public secondary schools in a single metropolitan district and is predominantly urban (77.3%). Private sector schools, which educate a substantial share of Pakistani secondary students under quite different governance, are unrepresented, as are rural districts. Replication across sectors and districts is required before these patterns can be treated as characteristic of Pakistani secondary education generally.

CONCLUSION AND IMPLICATIONS

Teachers in Lahore's public secondary schools perceive leadership as moderately to strongly distributed, and those perceptions are strongly associated with both their commitment to their schools and their satisfaction with their work accounting for more than a third of the variance in the former and more than half in the latter. The association holds in a system whose centralised governance offers head teachers little formal scope to redistribute authority, which supports the view that distributed leadership influences teacher attitudes primarily through the collegial practices it enables rather than through structural devolution.

The more consequential contribution, however, is the shape of what teachers reported. Consultation is plentiful; collective professional standards are not. Teachers are invited to speak but less often resourced to act, and they experience the head of department relationship as the weakest link in an otherwise collegial culture. This configuration is a warning against reading high distributed leadership scores as evidence of leadership quality. A school can score well on participation while setting no expectations worth participating in.

Three implications follow. For head teachers, the practical leverage identified here lies not in creating more opportunities for consultation teachers already report these in abundance but in coupling consultation to explicit collective standards and in strengthening the informational and decisional support that lets teachers act on what they contribute. For leadership development in Punjab, the uniformity of the findings across male and female school systems suggests that provision should be designed system-wide, with particular attention to the head of department tier, where the participatory culture is thinnest and where satisfaction ratings are lowest. For researchers, the priority is a multilevel, multi-informant replication capable of separating within- from between-school variance and of testing whether professional collaboration mediates the leadership-satisfaction relationship in South Asian systems as it appears to in Singapore and the United States.

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