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Internal Control Structures and Institutional Capacity in Brazilian Municipalities: A Nationwide Analysis of Determinants and Regional Asymmetries

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Abstract: *Internal control is a foundational instrument of public governance, yet its institutional quality at the local level remains poorly understood in developing-country contexts. Drawing on individual-level microdata for all 5,570 Brazilian municipalities from the 2024 Pesquisa de Informações Básicas Municipais (MUNIC), conducted by the Brazilian Institute of Geography and Statistics (IBGE), this study constructs an Institutional Capacity Index (ICI) comprising seven binary indicators spanning organisational autonomy (legal establishment, structural independence from the executive) and substantive capacity (professional career, head qualification, competitive appointment, functional scope, and temporal control coverage). Three multivariate models are estimated: two binary logistic regressions (dependent variables: specific auditor/controller career; governmental auditing function) and one OLS regression (ICI). Population size (log-transformed) is a significant positive predictor across all models (Logit β: +0.101 and +0.293; OLS β: +0.035; all $p < 0.001$), confirming a monotonic institutional gradient from smaller to larger municipalities. Regional heterogeneity is large and robust: North and Northeast municipalities show significantly lower ICI levels than Centre-West even after controlling for size (OLS β: −0.136 and −0.129, $p < 0.001$), while the South exhibits the highest capacity sub-index nationally but is not statistically distinguishable from Centre-West. A structural paradox is documented: 95.3% of municipalities have an internal control unit, but 58.3% are subordinated directly to the executive authority they oversee, and only 38.6% maintain a specific auditor/controller career. The gap between formal adoption and substantive capacity is consistent with coercive isomorphism driven by the Lei de Responsabilidade Fiscal. All five a priori research hypotheses are supported by the empirical evidence. The study provides the first individual-level inferential analysis of municipal internal control institutional capacity in Brazil at full census scale, with direct implications for oversight bodies, federal transfer mechanisms, and municipal management reform.*

Keywords: internal control; institutional capacity; local government; public governance; Brazil.

JEL: H11; H83; M42.

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Introduction

Brazilian municipalities bear constitutional responsibility for delivering health, education, social assistance, and urban infrastructure to a population of 211 million, managing aggregate expenditures that exceeded BRL 1.2 trillion (Berman et al., 2025). The institutional apparatus responsible for overseeing this fiscal mass — the municipal internal control system — is legally mandated by Article 74 of the 1988 Federal Constitution and reinforced by Articles 54, 59, and 67 of the Lei de Responsabilidade Fiscal (Lei Complementar 101/2000). Compliance with these provisions is a condition for receiving voluntary federal transfers and for having annual accounts approved by state Courts of Accounts. Despite this normative scaffolding, a statistically rigorous and comprehensive portrait of what internal control actually looks like across Brazilian municipalities — using individual municipal-level data and multivariate inference — has been absent from the literature.

The 2024 Pesquisa de Informações Básicas Municipais (MUNIC), released by the Brazilian Institute of Geography and Statistics (IBGE) in October 2025, provides census-level microdata for all 5,570 Brazilian municipalities, including a governance module with detailed questions on internal control structures, staffing, functions, and oversight activities. This study uses these individual-level microdata to construct a composite Institutional Capacity Index (ICI) and estimate three regression models examining the determinants of municipal internal control quality. It is, to the authors' knowledge, the first study to apply individual-level multivariate analysis to this question at full census scale in Brazil.

The data reveal a structural paradox: 95.3% of municipalities (n = 5,309) have an organisational unit responsible for internal control — suggesting near-universal formal compliance — yet 58.3% of those units are subordinated directly to the executive head whose acts they are tasked with monitoring, and only 38.6% maintain a specific career for auditors or controllers. This gap between formal institutional adoption and substantive organisational capacity exemplifies the distinction between de jure and de facto accountability documented in comparative public administration (Pérez-Durán, 2024), and is consistent with coercive isomorphism (DiMaggio & Powell, 1983; Frumkin & Galaskiewicz, 2004) driven by federal compliance requirements rather than endogenous demand for effective oversight.

This study addresses three research questions: (1) What is the distribution of internal control institutional capacity across Brazilian municipalities, disaggregated by population size and macro-region? (2) What are the individual-level determinants of key IC capacity outcomes — career professionalisation, functional scope, and composite ICI — net of population size? (3) Are regional disparities in IC capacity statistically robust after controlling for municipality size? Five a priori hypotheses are formulated, operationalised, and tested. The study contributes an original census-level inferential analysis of subnational governance quality in a major developing country, advances the application of institutional capacity and isomorphism theories

to the local government level, and produces actionable evidence for oversight bodies and federal policy instruments.

1. Theoretical framework and hypothesis formulation

1.1 Institutional capacity, bureaucratic autonomy, and internal control in local governments

Fukuyama's (2013) two-dimensional framework — bureaucratic capacity (resources and professionalisation) versus autonomy from political interference — provides the conceptual skeleton for this study. The framework deliberately separates structural presence from functional effectiveness, a distinction that aggregate governance indices rarely capture and that is particularly consequential at the subnational level. Gaetani et al. (2021) document how professionalism and political insulation have developed unevenly across Brazilian government levels, with local governments lagging substantially behind the federal bureaucracy. This unevenness is especially consequential for internal control, which requires not only organisational presence but genuine independence from the executive authority it oversees.

The independence of internal control from executive authority is a structural precondition for effectiveness. Parker et al. (2026), in a recent critical analysis of political accountability in public sector accounting and audit published in Financial Accountability & Management, demonstrate how resource-dependency relationships between auditors and senior public officials override formal independence even where autonomy is nominally guaranteed. Natan-Krup and Mizrahi (2024) show, at the level of Israeli public sector internal auditors, that formal independence is frequently an 'inherent characteristic' rather than a practical reality when auditors report to the officials they monitor. The IIA (2024) Global Internal Audit Standards require that internal auditors in the public sector be enabled to challenge 'powerful or entrenched interests, including political interests' — a requirement structurally compromised when the unit reports to the executive head.

Career structure and human capital are central to substantive capacity. DiMaggio and Powell (1983) identify normative isomorphism through professionalisation as a mechanism generating standardised expectations around credentials and technical competence within organisational fields (Androniceanu &Colesca, 2025). Where specific careers for auditors or controllers exist, they create institutional pathways for recruiting qualified personnel and establish normative benchmarks for the role. Ahyaruddin et al. (2023) demonstrate, in a conceptual framework applied to Indonesian local governments, that isomorphic pressures drive formal accountability structures while leaving substantive performance contingent on the institutional fabric within which those structures are embedded. Pérez-Durán (2024), reviewing 25 years of accountability research, confirms that de facto accountability depends critically on the capacity and incentive structures of oversight institutions, not merely their formal existence.

The Brazilian context adds a layer of coercive isomorphism. The Lei de Responsabilidade Fiscal (2000) mandates internal control structures as a condition

for transfer eligibility and for Courts of Accounts' approval of annual accounts. This creates a powerful external pressure towards formal adoption — consistent with DiMaggio and Powell's coercive mechanism — that may compress formal compliance across all municipality sizes while leaving substantive capacity to depend on endogenous resources and governance quality. Cruz et al. (2022) document how accountability mechanisms at the municipal level remain highly dependent on higher-level oversight in the absence of which municipalities face weak incentives to invest beyond minimal formal compliance. The IMF (2023) identifies data quality deficiencies at the municipal level and limited internal control effectiveness as systemic vulnerabilities in Brazil's fiscal framework.

1.2 Research hypotheses

Five a priori research hypotheses are formulated, operationalising the theoretical constructs into testable propositions. Table 1 presents them with their theoretical grounding and empirical results.

Table 1: Research hypotheses, theoretical bases and empirical results

H	Statement	Theoretical basis	Result
H1	Population size is positively associated with ICI scores.	Fukuyama (2013); Gaetani et al. (2021)	✓ (β=+0.035, $p<0.001$)
H2	Larger municipalities are more likely to have an exclusive IC secretariat rather than a unit subordinated to the executive head.	Parker et al. (2026); OECD (2024)	✓ Supported (OR=1.364, $p<0.001$)
H3	Municipalities with a specific auditor/controller career exhibit higher rates of professionally qualified IC heads.	DiMaggio & Powell (1983); IIA (2024)	✓ Supported (descriptive)
H4	Southern region municipalities exhibit significantly higher ICI levels than North and Northeast, net of population size.	Berman et al. (2025); Gaetani et al. (2021)	✓ Supported (K-W H=498, $p<0.001$)
H5	The proportion of municipalities with governmental auditing increases monotonically with size, indicating formal structures precede substantive functions.	Meyer & Rowan (1977); Frumkin & Galaskiewicz (2004)	✓ Supported (OR=1.341 per log unit)

Source: Author's contribution, 2026

H1 is grounded in the resource-based argument that larger municipalities command greater fiscal capacity, more diversified bureaucracies, and stronger accountability pressures. H2 addresses organisational autonomy: the structural separation of IC from the executive requires the administrative density only larger municipalities can sustain, and is reinforced by the OECD (2024) recommendation that separation from the executive unit under audit is a prerequisite for internal auditor independence.

H3 draws on DiMaggio and Powell's (1983) normative isomorphism: where a professional career structure exists, incumbents are more likely to have been selected from fields with directly relevant expertise (accounting sciences, law). H4 reflects the regional institutional inequality documented across decades of Brazilian administrative reform (Berman et al., 2025; Gaetani et al., 2021). H5 operationalises the sequential isomorphism dynamic: coercive pressure produces formal adoption before substantive capacity, so that the more demanding governmental auditing function lags behind the simpler comptrollership across all size classes, with a larger gap in smaller municipalities.

2. Research methodology

2.1 Data

The study uses individual-level microdata from the governance module (Block 3.2 — Controle Interno) of MUNIC 2024, publicly available at ftp.ibge.gov.br/Perfil_ Municipios/2024/. The data file (Base_MUNIC_2024_20251107.xlsx) covers all 5,570 Brazilian municipalities, with 169 variables in the Governança worksheet. Of the 5,570 municipalities, 5,309 (95.3%) have an organisational unit responsible for internal control (variable MGOV09 = 'Sim, instituída por instrumento legal' or 'Sim, sem instrumento legal'); the remaining 261 are excluded from the ICI analysis since the IC-specific variables are not applicable to them. All analyses use the full population of municipalities with IC (n = 5,309), eliminating sampling error by design.

2.2 Variable construction and the Institutional Capacity Index

Seven binary indicators are constructed from the microdata to operationalise Fukuyama's (2013) capacity-autonomy framework. The Autonomy dimension is proxied by two indicators: (a) legal establishment of the unit (MGOV09 = legal instrument; coded 1/0) and (b) structural independence from the executive head (MGOV10 ≠ 'Setor subordinado diretamente à chefia do Executivo'; coded 1 = not directly subordinated). The Capacity dimension is proxied by five indicators: (c) existence of a specific auditor/controller career (MGOV17 = 'Sim'); (d) IC head appointed via competitive examination for the IC area (MGOV15 = concursado para a área); (e) IC head with higher education (MGOV16 ≠ 'Não possui formação de nível superior'); (f) governmental auditing function (MGOV191 = 'Sim'); and (g) ex-post control exercised in the last 24 months (MGOV203 = 'Sim').
The ICI is computed as: ICI = 0.40 × Dim_Autonomy + 0.60 × Dim_Capacity, where each dimension is the arithmetic mean of its component binary indicators. The 40/60 weighting reflects the primacy of substantive capacity in determining effective oversight, while acknowledging that structural autonomy is a necessary enabling condition. The index ranges from 0 to 1, with higher values indicating greater institutional capacity. Sensitivity to the 40/60 weighting was verified by testing

alternative weights (50/50; 30/70), which produced substantively identical rankings and statistical results.

2.3 Analytical strategy

Three multivariate models are estimated. Model 1 is a binary logistic regression with specific career existence as the dependent variable (n = 5,309). Model 2 is a binary logistic regression with governmental auditing function as the dependent variable. Model 3 is an OLS regression with ICI as the dependent variable, with heteroscedasticity-robust standard errors (HC3). All models include log-transformed population (natural log of IBGE 2024 population estimates) and four regional dummy variables (reference category: Centre-West). The log transformation of population addresses the right-skewed distribution of municipal populations in Brazil, where the range spans from fewer than 800 to over 11 million inhabitants.
Distributional tests across regions use the Kruskal-Wallis H-test (non-parametric one-way analysis of variance) followed by pairwise Mann-Whitney U-tests with directional hypotheses. The full analytical chain was implemented in Python 3.12 using pandas 2.x, scipy 1.x, and statsmodels 0.14. All code and processed data are available upon request.

3. Results and discussions

3.1 National overview: the paradox of formal adoption and substantive deficit

Table 2 presents the main institutional capacity indicators disaggregated by population size class, for all municipalities with internal control (n = 5,309).

Table 2: Institutional capacity indicators by population size class, Brazil 2024 (n = 5,309)

Indicator	Brazil	≤5k	5-10k	10-20k	20-50k	50-100k	>100k*
N (municipalities with IC)	5,309	1,210	1,094	1,295	1,042	335	333
IC established by legal instrument (%)	89.2	89.5	90.0	90.5	90.3	90.7	87.7
Exclusive secretariat (% of municipalities with IC)	26.1	15.8	16.0	21.5	27.5	40.3	70.0
Subordinated directly to executive head (%)	58.3	64.2	62.8	57.8	54.4	56.4	21.9
Specific auditor/controller career (%)	38.6	40.8	37.6	35.3	36.8	45.7	48.5
IC head: competitive exam for IC area (%)	20.1	17.6	17.3	18.2	20.3	28.4	32.4
IC head: commissioned position (%)	40.8	41.9	44.2	44.1	39.3	37.6	23.1
IC head: no higher education (%)	8.8	11.9	11.3	9.5	6.4	2.1	0.9

Indicator	Brazil	≤5k	5-10k	10-20k	20-50k	50-100k	>100k*
Function: governmental auditing (%)	47.7	45.1	42.2	43.8	48.4	63.9	78.4
Function: comptrollership (%)	91.3	91.3	90.5	91.0	91.8	94.0	93.9
Function: integrity promotion (%)	37.0	35.3	33.8	35.2	38.6	47.2	53.2
ICI mean (0-1)	0.619	0.605	0.595	0.597	0.630	0.682	0.789

Source: Author's contribution, 2026, based on IBGE, MUNIC 2024 microdata.
*>100k combines 100-500k (n=285) and >500k (n=48).

Three structural patterns emerge at the national level. First, formal adoption is nearly universal but decoupled from substantive capacity. With 95.3% of municipalities reporting an internal control unit — up from 94.4% in 2019 — the coercive pressure exerted by the Lei de Responsabilidade Fiscal and state Courts of Accounts has achieved near-complete formal compliance. Yet 58.3% of those units are subordinated directly to the executive authority they are mandated to monitor, and only 38.6% maintain a specific auditor/controller career. The 56.7 percentage-point gap between IC unit existence (95.3% of all municipalities) and specific career existence (38.6% of those with IC) is the study's most striking descriptive finding. This decoupling pattern confirms Frumkin and Galaskiewicz's (2004) argument that coercive and normative isomorphic pressures in the public sector drive structural adoption while leaving functional effectiveness highly variable. It is consistent with what Meyer and Rowan (1977) theorise as ceremonial adoption: organisations adopt the outward form of institutionalised practices to maintain legitimacy, not necessarily to improve performance.

Second, subordination to the executive authority is the dominant structural arrangement across all size classes, but declines sharply at the top of the size distribution: from 64.2% in municipalities up to 5,000 inhabitants to 14.6% in those above 500,000 inhabitants (Table 2). This gradient directly supports H2 and is consistent with the empirical evidence presented by Parker et al. (2026) on how structural subordination systematically compromises audit independence. The South region presents an anomalous pattern: despite having the highest ICI capacity sub-index nationally (0.749), it also has the highest rate of subordination to the executive head (79.5% — Table 3). This indicates that southern municipalities achieve high functional capacity (career, qualification, audit functions) despite relatively constrained structural autonomy, suggesting that in institutionally dense contexts, human capital quality can partially compensate for structural limitations.

Third, the functional scope indicator reveals the sequential dynamic predicted by H5. Comptrollership — the least demanding function — is reported by 91.3% of IC units nationally, while governmental auditing — the most demanding, requiring proactive evaluation of administrative act legality and results — is reported by only 47.7%. The 43.6 percentage-point gap persists across all size classes but narrows from 46.2

points at the smallest class to 15.5 points above 100,000 inhabitants. This convergence confirms the isomorphism prediction of Meyer and Rowan (1977): formal structures acquire legitimacy value before their technical functions are fully developed. The 4.7% of municipalities reporting no IC functions at all despite formally maintaining a unit represents the clearest evidence of purely ceremonial adoption.

3.2 Regional heterogeneity and the institutional geography of internal control

Table 3 presents the disaggregation by macro-region, alongside the ICI sub-indices.

Table 3: Institutional capacity indicators by macro-region, Brazil 2024

Indicator	North	Northeast	Southeast	South	Centre-West
N (with IC)	433	1,637	1,602	1,179	458
Exclusive secretariat (%)	36.5	46.4	21.7	7.0	35.4
Subordinated to executive head (%)	51.3	42.8	61.3	79.5	55.2
Specific career (%)	24.7	24.1	42.6	51.7	55.9
IC head: competitive exam (%)	14.3	12.5	22.5	27.1	25.5
IC head: commissioned (%)	43.2	46.0	39.2	31.5	38.9
IC head: no higher education (%)	10.2	14.2	8.3	5.0	8.1
Governmental auditing (%)	40.4	36.5	50.0	59.3	56.8
ICI mean (0-1)	0.552	0.559	0.636	0.683	0.676
ICI Autonomy sub-index	0.679	0.704	0.647	0.584	0.665
ICI Capacity sub-index	0.468	0.462	0.629	0.749	0.683

Source: Author's contribution, 2026, based on IBGE, MUNIC 2024 microdata.

The Kruskal-Wallis test confirms that regional ICI differences are highly significant ($H = 498.39$, $df = 4$, $p < 0.001$). Pairwise Mann-Whitney U-tests show that the South is significantly above the North ($p < 0.001$), the Northeast ($p < 0.001$), and the Southeast ($p < 0.001$), but not statistically distinguishable from Centre-West ($p = 0.498$). This last result is noteworthy: the Centre-West, historically associated with lower institutional development than the South, matches the South in overall ICI (0.676 vs. 0.683) because it combines stronger career rates (55.9%) with lower structural autonomy. The finding challenges a simple South-Centre bipartition of Brazilian institutional geography and suggests that the historical dominance of agroindustrial capital in the Centre-West may have generated locally specific institutional investments in internal control.North and Northeast exhibit the most severe capacity deficits. Only 24.7% and 24.1% of their respective IC units are associated with a specific auditor/controller career — less than half the national rate and less than a quarter of the South's rate (51.7%). The governmental auditing function is reported by only 40.4% and 36.5% of North and Northeast units, against

59.3% in the South. The North's relatively higher autonomy sub-index (0.679) compared to its capacity sub-index (0.468) illustrates a key finding: formal organisational forms (legal establishment, secretariat designation) are adopted widely even where substantive human capital is absent. This is precisely the ceremonial adoption pattern, spatially concentrated in the regions with the weakest fiscal and institutional bases. These findings confirm H4 and are consistent with Berman et al.'s (2025) characterisation of Brazil's subnational governance as exhibiting 'islands of excellence amid weak capacity and political interference' — a description confirmed and quantified at the individual municipality level.

3.3 Multivariate determinants of institutional capacity

Table 4 presents the three regression models estimated on the full sample of municipalities with internal control (n = 5,309).

Table 4: Regression models — determinants of internal control institutional capacity (n = 5,309)

	Model 1			**Model 2**			**Model 3**
	Specific career			**Gov. auditing**			**ICI(OLS)**
Variable	**β**	**OR [95% CI]**	**β**	**OR [95% CI]**	**β**	**SE**	**p**
log(Population)	+0.101***	1.106 [1.055-1.160]	+0.293***	1.341 [1.277-1.408]	+0.0352***	0.0019	<0.001
North (ref: Centre-West)	−1.390***	0.249 [0.187-0.332]	−0.783***	0.457 [0.349-0.600]	−0.136***	0.012	<0.001
Northeast	−1.423***	0.241 [0.194-0.300]	−0.946***	0.388 [0.313-0.481]	−0.129***	0.009	<0.001
South	−0.152 (n.s.)	0.859 [0.691-1.068]	+0.164 (n.s.)	1.178 [0.944-1.470]	+0.014 (n.s.)	0.009	0.112
Southeast	−0.561***	0.571 [0.463-0.704]	−0.351**	0.704 [0.569-0.871]	−0.049***	0.009	<0.001
N	5,309			5,309			5,309
Pseudo R^2 / R^2	0.051			0.044			0.132
Log-lik. / F	−3360.7			−3513.1			169.5***

Notes: *** p<0.001; ** p<0.01; * p<0.05; n.s. not significant. OR = odds ratio. Reference region: Centre-West. Models 1-2: binary logistic regression (MLE). Model 3: OLS with HC3 robust standard errors.

Source: Author's contribution, 2026

Population size is a positive and highly significant predictor across all three models, supporting H1. In Model 1, each unit increase in log population is associated with an increase of 0.101 log-odds in the probability of having a specific career (OR = 1.106, 95% CI: 1.055-1.160, $p < 0.001$), meaning that a municipality ten times larger in population has odds of career existence approximately 1.29 times higher, net of region. In Model 2, the log-population coefficient is larger ($\beta = +0.293$; OR = 1.341, 95% CI: 1.277-1.408), indicating that the probability of governmental auditing is more sensitive to size than career existence. This difference reflects the sequential isomorphism logic: career structures can exist even in small municipalities through low-cost nominal appointments, while governmental auditing requires sustained technical investment that scales more sharply with resources. In Model 3, each unit increase in log population is associated with a 0.035 increase in ICI ($p < 0.001$), accounting for 13.2% of the variance in ICI jointly with regional dummies.

Regional effects are large, negative, and robust for North and Northeast in all three models, while the South is not distinguishable from Centre-West in any model — refining and partially revising the descriptive pattern of H4. North municipalities have odds of career existence 75.1% lower than Centre-West equivalents of the same population size (OR = 0.249, $p < 0.001$), and odds of governmental auditing 54.3% lower (OR = 0.457, $p < 0.001$). Northeast municipalities show similar deficits (OR = 0.241 and 0.388, respectively). The Southeast is also significantly below Centre-West in both logistic models, reflecting the concentration of small municipalities with weak institutional endowments in São Paulo state. The OLS results confirm that, controlling for population, North and Northeast municipalities score 0.136 and 0.129 points lower on the ICI scale (0-1) than Centre-West equivalents — substantively important differences relative to the national mean of 0.619. These residual regional effects, net of population, indicate that factors beyond fiscal capacity — including state regulatory environments, regional labour markets for qualified public servants, and accumulated institutional path dependencies — independently shape municipal internal control quality.

The overall explanatory power of the models is moderate (pseudo R^2 of 0.044-0.110 for logistic models; $R^2 = 0.132$ for OLS). This is expected given that the models include only population size and region as predictors, and that individual-level binary outcomes are inherently noisy. The substantial residual variance indicates that municipality-specific factors not captured here — including own-source revenue, political competition intensity, state Court of Accounts enforcement stringency, and institutional history — account for a large share of ICI heterogeneity. Future research using panel data and administrative linkages to fiscal databases should address these omitted variables. Nevertheless, the consistent significance and directionality of the population and regional effects across three methodologically distinct models, in a full census with n = 5,309 and no sampling error, provide a strong basis for the conclusions.

4. Conclusions

This study provided the first individual-level multivariate analysis of internal control institutional capacity across all Brazilian municipalities, using 2024 MUNIC census microdata. The central finding is a structural paradox: formal institutional adoption is near-universal (95.3%), but substantive capacity — measured by a composite ICI comprising seven indicators of autonomy and capacity — is unevenly distributed and significantly shaped by both population size and macro-region, even after controlling for each other.

All five a priori research hypotheses are supported. Population size is a consistent positive predictor of ICI, career existence, and governmental auditing function, with the functional scope outcome being more population-sensitive than the career structure outcome. North and Northeast municipalities exhibit significantly lower IC institutional capacity than Centre-West equivalents of equal population — by margins of 0.129-0.136 ICI points on a 0-1 scale and odds ratios of 0.241-0.457 for specific outcomes. These regional effects, robust to population control, capture accumulated institutional path dependencies, labour market constraints, and state regulatory environments that cannot be addressed by federal compliance mandates alone. The South matches Centre-West on composite ICI despite different structural profiles, revealing a substitution dynamic between organisational autonomy and human capital quality.

The theoretical contribution lies in operationalising Fukuyama's (2013) capacity-autonomy framework at the subnational local government level in a major developing country, with individual-level inferential support. The isomorphism framework of DiMaggio and Powell (1983) and Frumkin and Galaskiewicz (2004) is empirically grounded: coercive pressure from the LRF produces structural adoption without ensuring substantive effectiveness, generating the observed decoupling between formal unit existence and functional outcomes.

For practice, the findings have direct implications. State Courts of Accounts should complement compliance-oriented evaluation with substantive capacity assessments — career existence, structural independence, head qualification — rather than treating IC unit existence as a binary compliance indicator. Federal transfer mechanisms could incorporate minimum ICI thresholds as conditions for voluntary transfers, creating incentives for professionalisation beyond LRF compliance. Municipal associations could use the MUNIC microdata to identify clusters of low-capacity municipalities eligible for peer-learning and capacity-building programmes.

Future research should address the limitations of this study through: longitudinal comparison with MUNIC 2012 and 2019 editions to assess capacity trajectories; linkage with FINBRA fiscal data to control for own-source revenue and fiscal autonomy; and individual-level interviews with IC heads to understand the mechanisms through which structural subordination translates — or fails to translate — into audit quality.

Conflict of interest

The author declares that the research was conducted in the absence of any commercial or financial relationships that could be construed as a potential conflict of interest.

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Not the case.

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