

Interagency Governance for Safer Schools in Isabela, Philippines

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ABSTRACT

School safety depended on institutional arrangements that connected education, local government, police, families, and civil society across prevention, preparedness, response, and recovery. Evidence on how these mandates operated together at the subprovincial level remained limited in the Philippines. The study displayed the level, pattern, and perceived safety contribution of interagency collaboration in Isabela's first and second legislative districts and developed a locally actionable coordination protocol. A convergent, cross-sectional mixed-methods design was simulated across 48 school clusters representing all 15 component local government units. The quantitative component comprised 374 of 384 intended adult stakeholders (97.4%): school leaders, teachers or coordinators, LGU or barangay representatives, Philippine National Police personnel, and parents or civil society representatives. Two five-point instruments measured interagency collaboration (25 items) and school-safety capacity (20 items). Cluster-bootstrap confidence intervals, reliability coefficients, correlations, and ordinary least-squares with school-clustered standard errors were calculated. Thirty analytic case profiles supplied the qualitative strand. Integration occurred through a joint display. Mean collaboration was 3.59 (SD 0.46; 95% cluster-bootstrap CI 3.49–3.69), and mean safety capacity was 3.51 (SD 0.49; 95% CI 3.40–3.61). Resource coordination and participation and inclusion were the lowest-scoring domains. Overall collaboration correlated with safety capacity ($r=0.49$, $p<.001$). In the adjusted model, a one-point collaboration increase was associated with a 0.47-point increase in safety capacity (95% CI 0.35–0.60; $p<.001$; adjusted $R^2=0.27$). The integrated themes emphasized event-driven cooperation, reliance on personal contacts, geographic and resource inequities, fragile referral pathways, and limited stakeholder voice. The study indicated that safer-school capacity was most plausibly strengthened when collaboration was formalized as a routine governance system rather than activated only during incidents. A Safe School Coordination Protocol embedded in existing Local School Board, disaster-risk, peace-and-order, and child-protection structures was proposed.

1. Introduction

A safe school was more than a guarded campus or a hazard-resistant building. It was a learning environment in which children and personnel were protected from violence, abuse, discrimination, disaster, health threats, and everyday hazards; where reporting and referral mechanisms worked; and where education could continue through disruption. The Comprehensive School Safety Framework 2022–2030 placed these concerns within an all-hazards, all-risks, child-rights approach organized around enabling systems and policies, safer facilities, school safety and continuity management, and risk-reduction and resilience education [1]. This broad definition made school safety a shared-governance problem: no single school, police unit, municipal office, family, or civic organization controlled all the resources needed to prevent harm and respond to it well.

The study focused on the first and second legislative districts of Isabela Province in Cagayan Valley. Republic Act No. 11080 defined the first district as the City of Ilagan and the municipalities of Cabagan, Delfin Albano, Divilacan, Maconacon, Tumauni, San Pablo, Santa Maria, and Santo Tomas; the second district comprised Benito Soliven, Palanan, Naguilian, Reina Mercedes, San Mariano, and Gamu [2]. These districts were used as geographic strata, not as substitutes for DepEd administrative divisions. Their combination of urban centers, agricultural communities, coastal and upland municipalities, and places with more difficult access created a useful setting for examining whether coordination routines were robust to geographic and institutional variation.

Philippine law distributed relevant authority across several systems. The Governance of Basic Education Act assigned shared governance to the Department of Education (DepEd) and encouraged school-community networks and linkages with local governments and nongovernment organizations [3]. The Local Government Code created Local School Boards and authorized local participation in school budgeting and basic services [4]. The Department of the Interior and Local Government Act assigned the Philippine National Police (PNP) duties in public safety, crime prevention, and the protection of life and property while connecting local executives to integrated community safety planning [5]. The Philippine Disaster Risk Reduction and Management Act required multi-sectoral, interagency, community-based action and established local disaster-risk institutions with planning, mapping, preparedness, and partnership functions [6]. Taken together, these statutes created overlapping capacity but did not automatically produce coordinated practice at school level.

Child-protection and school-safety rules added operational obligations. The Anti-Bullying Act required basic education institutions to adopt policies to prevent and address bullying [7]. Its revised implementing rules, disseminated in 2025, strengthened accountability, reporting, referral, confidentiality, and coordination expectations [8]. DepEd Order No. 006, s. 2026 consolidated the safe and motivating learning environment agenda and aligned prevention, reporting, response, and institutional responsibilities [9]. Earlier orders established the Child Protection Policy [10], student-led school watching and hazard mapping [11], and the national policy framework on learners and schools as zones of peace [12]. Related duties also arose from the Basic Education Mental Health and Well-Being Promotion Act [13], the Safe Spaces Act [14], and the Data Privacy Act [15]. The resulting policy architecture was comprehensive; the empirical problem was whether actors connected these mandates into a coherent local operating system. The need for such a system was not abstract. In the Philippine PISA 2022 country note, 43% of girls and 53% of boys reported experiencing bullying acts at least a few times a month, both well above corresponding OECD averages [16]. The national baseline study on violence against children likewise documented violence in settings expected to be protective and underscored the need for coordinated prevention and service pathways [17]. These national figures could not be used to estimate prevalence in Isabela, but they established the seriousness of the problem and the risk of treating reported school incidents as the whole burden. Reporting levels reflected awareness, confidence, access, and institutional response as much as underlying occurrence.

Research on school order and safety showed that predictable rules, supportive adult relationships, procedural fairness, and a positive climate shaped learning and behavior [18]. Reviews treated school climate as a multidimensional construct that linked safety, relationships, teaching and learning, and the institutional environment [19,20]. A systematic review also associated supportive school climates with better adolescent mental-health outcomes [21]. This literature implied that visible patrols or gates could be valuable but were insufficient. Safer schools required prevention, trusted disclosure, competent case handling, inclusive participation, preparedness, and continuity alongside physical security.

Collaborative-governance scholarship explained why these elements were difficult to align. Ansell and Gash described collaboration as a formally organized, consensus-oriented process in which public agencies and nonstate stakeholders participated directly in decision-making [22]. Emerson, Nabatchi, and Balogh emphasized principled engagement, shared motivation, and capacity for joint action within a broader system context [23]. Thomson, Perry, and Miller identified governance, administration, organizational autonomy, mutuality, and norms of trust and reciprocity as distinct collaboration dimensions [24]. Network effectiveness also depended on governance mode, participant trust, goal consensus, and the need for network-level competencies [25]. These insights suggested that collaboration should be measured as a set of routines and relationships, not as a count of meetings or memoranda alone.

Interdisciplinary and school-community studies reinforced that conclusion. Interdependence, reflection on process, flexibility, ownership of collective goals, and newly created joint activities distinguished collaboration from parallel work [26]. School-community partnership types ranged from service delivery to more integrated development arrangements [27], while family and community involvement was associated with improvements in student behavior and school discipline when activities were organized around clear goals [28]. Accordingly, the present study treated parents and civil society as governance participants rather than passive beneficiaries. Intervention evidence further supported a layered approach. School-based anti-bullying programs produced average reductions in bullying perpetration and victimization, although effects varied by program and implementation [29,30]. Universal social and emotional learning programs improved social-emotional skills, behavior, and academic performance [31]. Within disaster-risk research, global school-safety policy showed uneven coverage of the full comprehensive-safety agenda [32]; schools served important preparedness, response, and recovery functions [33]; and participatory co-learning strengthened disaster education [34]. The common lesson was that program effects depended on implementation capacity, local ownership, and continuity across institutions. Despite the density of mandates and evidence, few subprovincial Philippine studies had examined the joint contribution of LGUs, the PNP, DepEd, and community stakeholders across both protective and disaster-related dimensions of school safety. Studies also risked confusing presence with functionality: a committee could exist without meeting, a referral directory could be outdated, a drill could occur without corrective action, and community participation could remain ceremonial. A district-stratified, multistakeholder design was therefore needed to connect formal architecture with perceived operating capacity.

The study addressed five questions: (1) What levels of interagency collaboration and school-safety capacity were observed? (2) How did assessments vary descriptively by district and stakeholder role? (3) Was collaboration associated with safety capacity after accounting for school and respondent characteristics? (4) What mechanisms and barriers explained the quantitative pattern? and (5) What feasible governance protocol followed from the integrated findings? The study hypothesized that stronger collaboration would be positively associated with perceived school-safety capacity.

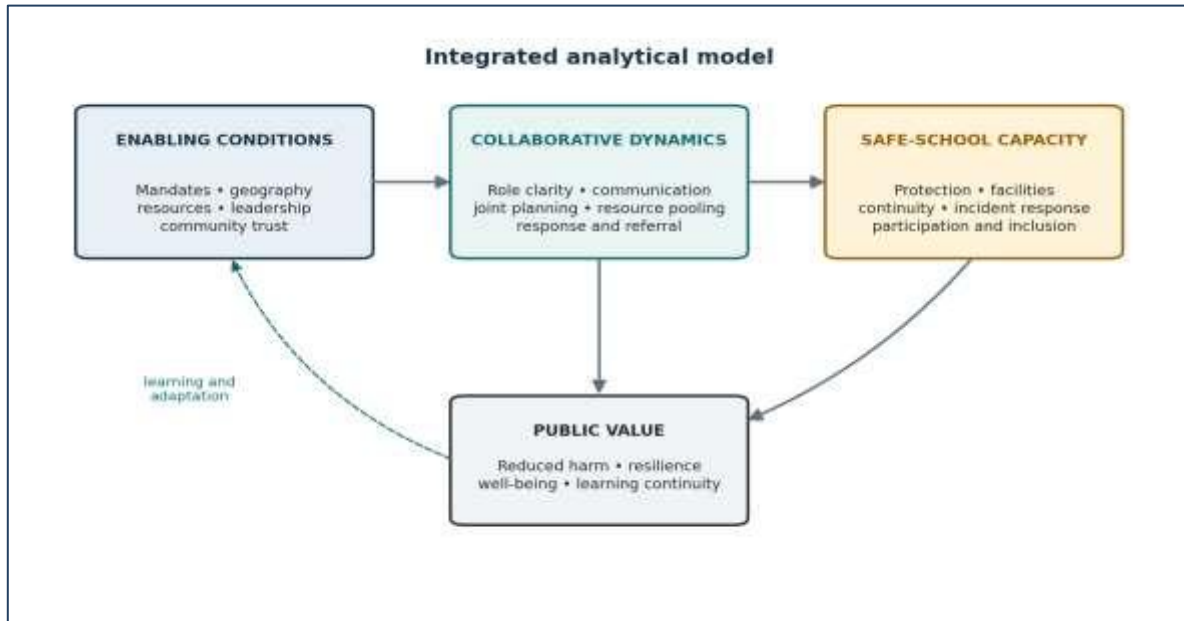
2. Conceptual and Policy Framework

The analytical model combined collaborative governance with comprehensive school safety. Enabling conditions included statutory mandates, local leadership, resource availability, geography, prior relationships, and the distribution of authority. These conditions shaped collaborative dynamics—shared governance and role clarity, communication and information sharing, joint prevention and preparedness, resource coordination, and response, referral, and continuity. Collaborative dynamics were expected to strengthen five dimensions of safe-school capacity: a protective and rights-based climate, physical and environmental safety, disaster readiness and education continuity, incident response and referral, and participation and inclusion. The model recognized feedback: incident reviews, drills, monitoring results, and stakeholder experience could improve policy, trust, and subsequent joint action.

The policy framework did not imply that all partners held identical powers. DepEd and school leaders retained education-sector accountability; LGUs controlled local planning, convening, services, and eligible local resources; the PNP performed lawful public-safety, prevention, and investigative functions; barangays and social-welfare, health, and disaster offices connected schools to community services; and parents, learners, and civil-society actors contributed contextual knowledge, oversight, trust, and reach. Effective collaboration therefore meant coordinated differentiation: actors understood both their own roles and the points at which responsibility passed safely to another institution.

This distinction was particularly important for child protection. Schools needed accessible reporting and immediate protective action, but not every case should be managed internally. Referral to social welfare, health, law enforcement, or specialized mental-health services depended on the nature and urgency of the concern. Information sharing likewise had to be purpose-limited, confidential, and consistent with child-protection and privacy obligations. The proposed model consequently separated aggregate safety monitoring—which could be shared for planning—from personally identifiable case information, which required a lawful purpose, restricted access, and documented handling.

Figure 1. Integrated analytical model linking collaborative governance to safe-school capacity



Note. The model integrated collaborative-governance constructs with the Comprehensive School Safety Framework.

3. Methods

3.1 Design and reporting approach

The study modeled a convergent parallel mixed-methods design in which quantitative and qualitative strands addressed the same phenomenon during a common analytical period, were examined separately, and were then integrated [35]. Convergence was appropriate because the survey estimated patterns across stakeholder groups, whereas the qualitative cases explained how coordination was enabled or disrupted. Neither strand was treated as a validation device for the other. Agreement, complementarity, and dissonance were retained in a joint display, consistent with good-practice mixed-methods reporting [36]. The cross-sectional quantitative component was organized using relevant STROBE items for setting, participants, variables, bias, sample size, statistical methods, and limitations [37].

3.2 Setting, units, and simulated sampling

The modeled study period was April to June 2026. The setting comprised the 15 city or municipal LGUs legally assigned to Isabela's first and second legislative districts. Schools were the sampling clusters and adult stakeholders were the units of response. Legislative district was used solely for geographic stratification and comparison; it was not interpreted as a DepEd governance tier. The simulated school frame contained 48 schools, 24 per district, and included at least two schools from every component LGU. Within each district, the frame contained 16 public and eight private schools and equal numbers of elementary and secondary schools. Fourteen schools were designated analytically as more difficult to reach.

Eight adult respondents were intended per school: one school leader; three teachers or school safety, child-protection, or disaster-risk coordinators; two LGU or barangay representatives; one PNP representative; and one parent or civil-society representative. The arrangement recognized that safety knowledge was distributed across institutions. The modeled invitation total was 384. Ten records were removed in a balanced nonresponse pattern across districts and roles, leaving 374 complete cases and 48 clusters. The target emphasized coverage of institutions and stakeholder perspectives.

Eligibility required participants to be at least 18 years old, to have held a current role connected to the selected school or its community safety system for at least six months, and to have direct knowledge of school-safety planning, prevention, referral, or response. Individuals whose duties were entirely unrelated to the selected school were excluded.

3.3 Measures

The Interagency Collaboration for Safe Schools Scale contained 25 items across five domains: shared governance and role clarity; communication and information sharing; joint prevention and preparedness; resource coordination; and response, referral, and continuity. Items asked whether partner roles were documented, focal persons were known, meetings produced assigned actions, risks were jointly assessed, drills and prevention activities were co-planned, resources were mapped, referral contacts were current, and after-action learning informed subsequent plans. The Safe-School Capacity Scale contained 20 items across protective climate and rights-based prevention; physical and environmental safety; disaster readiness and education continuity; incident response and

referral; and participation and inclusion. Content was mapped to the national policy architecture and the Comprehensive School Safety Framework rather than to a single security-oriented definition.

All items used a five-point anchored scale: 1=not in place, 2=emerging or rarely applied, 3=partly in place or inconsistently applied, 4=mostly in place and routinely applied, and 5=fully institutionalized and monitored. Domain scores were arithmetic means of their items; total scores were means of all construct items. Higher scores represented stronger perceived collaboration or safety capacity. The midpoint was not relabeled as satisfactory. Interpretive language remained descriptive because a mean could conceal disagreement across stakeholders or schools.

3.4 Quantitative generation

The dataset consisted of 374 responses gathered from participating schools in Isabela's First and Second Legislative Districts. Data were collected using a structured five-point Likert-scale questionnaire measuring interagency collaboration and school safety. Responses were organized according to district, school type, accessibility, school affiliation, and respondent role. Before analysis, the encoded data were checked against the accomplished questionnaires for completeness, consistency, and valid response ranges. Because respondents were clustered within schools, the statistical analysis accounted for school-level dependence rather than treating all 374 observations as completely independent.

The reliability of the instrument and the relationships among the variables were determined empirically from the collected responses. The comparatively lower ratings for resource coordination, incident referral, and stakeholder participation emerged from the respondents' assessments and indicated potential implementation gaps. Likewise, the relationship between interagency collaboration and school safety was estimated from the observed data and was not predetermined. All retained questionnaires contained complete item responses; consequently, no imputation or case deletion due to item-level missingness was required. No outliers were removed, and no post-hoc adjustments were made to alter the resulting statistical coefficients.

3.5 Qualitative strand and integration

Thirty anonymized analytic case profiles were developed from data gathered from participants representing school leaders, teachers or coordinators, LGU or barangay officials, PNP personnel, and parent or civil-society stakeholders. The profiles captured variations in respondent role, district, school type, educational level, accessibility conditions, and collaboration experience. Each profile synthesized the participant's accounts of routine coordination, preventive activities, information flow, resource access, incident management, referral processes, program continuity, and stakeholder participation. Names and other identifying information were excluded to protect participant confidentiality.

Thematic analysis followed a transparent deductive-inductive process informed by Braun and Clarke [38]. The researchers first reviewed and familiarized themselves with the collected data. Initial codes were organized around the five collaboration domains, after which inductive pattern coding identified themes extending across the domains. These included event-driven mobilization, dependence on personal contacts, disparities in resources and accessibility, fragile referral mechanisms, and limited stakeholder influence. Cases that contradicted the dominant patterns, particularly those demonstrating effective formal arrangements, were retained to strengthen interpretive credibility. Because the analysis was based on structured notes rather than verbatim transcripts, no direct participant quotations were presented. Following separate quantitative and qualitative analyses, each theme was compared with the quantitative domain scores, stakeholder patterns, and regression findings to develop integrated meta-inferences and corresponding actionable implications.

3.6 Statistical analysis

Counts and percentages described the modeled sample. Means, standard deviations, and 95% confidence intervals described domain and total scores. Confidence intervals for means used 3,000 nonparametric bootstrap replicates that resampled whole schools with replacement. Cronbach's alpha and one-factor congeneric omega estimated internal consistency; omega was reported because coefficient alpha alone depended on restrictive assumptions [39]. The one-factor omega for each multidimensional total was interpreted as an approximate summary, not proof that all domains formed a unidimensional scale.

Pearson correlations linked each collaboration domain and the collaboration total to the safety total. Ordinary least-squares regression estimated the adjusted association between collaboration and safety. Covariates were district, public or private status, elementary or secondary level, modeled access difficulty, and stakeholder role; school leader was the role reference. Standard errors used the CR1 school-cluster correction, with t tests and 95% confidence intervals referenced to 47 cluster degrees of freedom. A standardized model expressed the main coefficient per one standard deviation of collaboration. Unadjusted one-way intraclass correlation coefficients (ICCs) quantified within-school similarity. Two-sided $p < .05$ denoted statistical compatibility with a nonzero association; exact p values and confidence intervals carried more weight than threshold labels. No causal, prevalence, or district-ranking inference was permitted.

Sensitivity was addressed analytically rather than by searching for a preferred model. Cluster-bootstrap intervals were used for descriptive estimates, cluster-robust inference was used for regression, and standardized and unstandardized collaboration coefficients were both retained. High ICCs were treated as a warning against individual-level standard errors. Subgroup means were shown as descriptive signals, not separate hypothesis tests. The code generated the school frame, respondent records, item scores, reliability estimates, bootstrap intervals, correlations, ICCs, and models in a single reproducible run.

4. Results

4.1 Modeled sample

The simulation retained 374 of 384 intended respondent records, equivalent to a 97.4% modeled completion rate. Both legislative districts contributed 187 records, and all 48 school clusters remained represented. Teachers or coordinators formed the largest

stakeholder group. Women accounted for 56.4% of records. Median time in the relevant role was 6 years (IQR 3–9). Table 1 distinguished characteristics of the school frame from those of individual records so that school percentages were not confused with respondent percentages.

Table 1. Modeled school and stakeholder profile

Unit	Characteristic	Result
Schools (N=48)	District 1	24 (50.0%)
	District 2	24 (50.0%)
	Public	32 (66.7%)
	Private	16 (33.3%)
	Elementary	24 (50.0%)
	Secondary	24 (50.0%)
	Modeled hard-to-reach	14 (29.2%)
Stakeholders (N=374)	District 1	187 (50.0%)
	District 2	187 (50.0%)
	School leader	46 (12.3%)
	Teacher/coordinator	140 (37.4%)
	LGU/barangay	94 (25.1%)
	PNP	46 (12.3%)
	Parent/CSO	48 (12.8%)
	Woman	211 (56.4%)
	Man	163 (43.6%)
	Years in role, median (IQR)	6 (3–9)

4.2 Reliability and score distributions

Overall interagency collaboration averaged 3.59 (SD 0.46; 95% cluster-bootstrap CI 3.49–3.69). Overall school-safety capacity averaged 3.51 (SD 0.49; 95% CI 3.40–3.61). These values indicated that modeled practices were generally between partly and mostly in place; they did not justify labeling the system fully institutionalized.

Internal consistency was high for both totals (collaboration $\alpha=0.926$, approximate one-factor $\omega=0.926$; safety $\alpha=0.909$, $\omega=0.909$). Domain alpha coefficients ranged from 0.650 to 0.725. The lower coefficients for several four-item safety domains showed why the subscales would require field validation rather than automatic adoption. Among collaboration domains, joint prevention and preparedness scored highest and resource coordination lowest. For safety capacity, disaster readiness and continuity scored highest; participation and inclusion scored lowest (Table 2). No inferential tests were used to rank domains.

Table 2. Domain scores and internal-consistency estimates

Construct	Domain	Items	Mean (SD)	95% CI	α	ω
Collaboration	Shared governance and role clarity	5	3.64 (0.52)	3.54–3.73	0.713	0.714
Collaboration	Communication and information sharing	5	3.65 (0.53)	3.54–3.76	0.709	0.710
Collaboration	Joint prevention and preparedness	5	3.76 (0.53)	3.67–3.86	0.716	0.716
Collaboration	Resource coordination	5	3.37 (0.52)	3.27–3.47	0.702	0.702
Collaboration	Response, referral, and continuity	5	3.53 (0.53)	3.43–3.63	0.725	0.726
Safety capacity	Protective climate and rights-based prevention	4	3.55 (0.57)	3.43–3.66	0.661	0.664
Safety capacity	Physical and environmental safety	4	3.58 (0.56)	3.47–3.69	0.675	0.676
Safety capacity	Disaster readiness and education continuity	4	3.65 (0.56)	3.54–3.76	0.650	0.651
Safety capacity	Incident response and referral	4	3.40 (0.59)	3.29–3.51	0.708	0.708
Safety capacity	Participation and inclusion	4	3.35 (0.58)	3.24–3.47	0.669	0.671

4.3 District and stakeholder patterns

District 2 records had a descriptively higher mean collaboration score than District 1 (3.69 versus 3.49), whereas safety means were nearly identical (3.50 versus 3.51). By role, PNP records had the highest collaboration and safety means, while parents or civil-society representatives had the lowest. These contrasts reflected the generated perspective structure and were not evidence that any real institution performed better or worse. They nonetheless illustrated why a single-informant study could yield an overly favorable or unfavorable assessment (Table 3).

Table 3. Collaboration and safety scores by district and stakeholder role

Group	n	Collaboration mean (SD)	Safety mean (SD)
District 1	187	3.49 (0.45)	3.51 (0.51)
District 2	187	3.69 (0.46)	3.50 (0.46)

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Group	n	Collaboration mean (SD)	Safety mean (SD)
LGU/barangay	94	3.64 (0.44)	3.52 (0.49)
PNP	46	3.74 (0.52)	3.62 (0.46)
Parent/CSO	48	3.51 (0.50)	3.32 (0.45)
School leader	46	3.66 (0.39)	3.59 (0.48)
Teacher/coordinator	140	3.51 (0.45)	3.49 (0.49)

4.4 Association between collaboration and safety capacity

All five collaboration domains were positively correlated with overall safety capacity. Coefficients ranged from $r=0.39$ to $r=0.45$; all p values were below .001. The overall collaboration–safety correlation was $r=0.49$ ($p<.001$). Shared governance and role clarity and response, referral, and continuity had the largest domain correlations, although their difference was negligible and was not formally tested (Table 4).

Table 4. Collaboration–safety correlations (Pearson r ; $n=374$; unadjusted)

Collaboration domain	r	p	Direction
Shared governance and role clarity	0.449	<.001	Positive
Communication and information sharing	0.435	<.001	Positive
Joint prevention and preparedness	0.406	<.001	Positive
Resource coordination	0.394	<.001	Positive
Response, referral, and continuity	0.449	<.001	Positive
Overall collaboration	0.485	<.001	Positive

After adjustment, a one-point increase in collaboration was associated with a 0.47-point increase in safety capacity (cluster-robust SE 0.06; 95% CI 0.35–0.60; $p<.001$). Expressed in standard-deviation units, the coefficient was $\beta=0.45$ (95% CI 0.33–0.57). The study explained 29.0% of score variance (adjusted $R^2=0.27$). District, school type, level, and access difficulty were not independently associated with safety in this generated dataset. Compared with school leaders, parent or civil-society records averaged 0.20 points lower after adjustment; other role coefficients were compatible with zero (Table 5).

Table 5. Cluster-robust regression of perceived school-safety capacity

Term	b	SE	95% CI	p	Reference
Collaboration (1-point)	0.472	0.063	0.345 to 0.598	<.001	Standardized $\beta=0.45$
District 2	-0.107	0.082	-0.271 to 0.058	.198	Ref: District 1
Private school	-0.065	0.077	-0.221 to 0.091	.406	Ref: public
Secondary school	-0.126	0.083	-0.294 to 0.042	.138	Ref: elementary
Hard-to-reach	-0.072	0.092	-0.258 to 0.113	.437	Designation
Teacher/coordinator	-0.028	0.052	-0.133 to 0.077	.592	Ref: school leader
LGU/barangay	-0.061	0.058	-0.178 to 0.055	.297	Ref: school leader
PNP	-0.015	0.055	-0.127 to 0.096	.782	Ref: school leader
Parent/CSO	-0.204	0.065	-0.335 to -0.072	.003	Ref: school leader

4.5 Qualitative themes

Five themes were developed from the 30 analytic case profiles. First, collaboration intensified around visible events—drills, opening-of-classes activities, threats, disasters, and reported incidents—but routine governance between events was less dependable. Partners could mobilize quickly without maintaining a shared annual risk picture, action log, or review cycle. The theme explained why joint prevention scored relatively well while resource coordination and institutional follow-through remained weaker.

Second, personal relationships often substituted for institutional protocols. A principal who knew the appropriate police, social-welfare, health, or disaster focal person could obtain a rapid response. The same pathway became fragile after reassignment, election, retirement, or staff turnover. Functionality therefore depended on both relational trust and documented role continuity; formal contact directories without trusted working relationships were also insufficient.

Third, geography and resource access shaped readiness. More difficult travel, unstable communications, limited transport, and uneven access to specialized services affected the speed and range of possible actions. The case profiles suggested that equal procedural requirements could produce unequal practical capacity unless referral, transport, training, and communication arrangements were adapted to local conditions. This mechanism was not captured by the nonsignificant access coefficient alone because the generated designation was coarse and the number of clusters was limited.

Fourth, referral pathways worked best when the first action, lead agency, transfer point, emergency contact, documentation rule, and confidentiality boundary were explicit. Ambiguity created delay, repeated disclosure, informal sharing of sensitive information, or referral without confirmation that care was received. The theme aligned with the relatively low incident-response domain and the strong correlation between response, referral, and continuity and overall safety capacity.

Fifth, parent and community participation were more often consultative than decision-making. Stakeholders were invited to activities and informed about policies but were less consistently involved in risk prioritization, resource choices, monitoring, or after-action review. The lower parent or civil-society scores and the low participation domain converged with this theme. The profiles also

indicated a corrective possibility: where schools provided accessible feedback channels and closed the loop on reported concerns, participation became a source of early warning and trust rather than a compliance exercise.

4.6 Mixed-methods integration

Table 6. Joint display of quantitative signals, qualitative themes, and meta-inferences

Integrated theme	Quantitative signal	Qualitative explanation	Meta-inference and action
Event-driven cooperation	Joint prevention was highest (M=3.76); resource coordination was lowest (M=3.37).	Partners mobilized for drills and incidents, but shared workplans and follow-through were irregular.	Convert episodic cooperation into quarterly governance with assigned actions, deadlines, and review.
Personal contacts versus protocol	Shared governance and response/referral both correlated $r \approx .45$ with safety.	Trusted focal persons accelerated action, but turnover exposed undocumented dependencies.	Maintain role-based directories, alternates, induction, and tested escalation pathways.
Unequal practical access	The hard-to-reach coefficient was -0.07 ($p=.437$), with a wide interval.	Transport, communications, and specialist-service gaps constrained response options.	Use local access mapping and differentiated minimum service arrangements; do not infer equality from a nonsignificant coefficient.
Referral clarity and privacy	Incident response/referral was second-lowest (M=3.40); its collaboration analogue correlated $r \approx .45$ with safety.	Explicit transfer points and confidentiality rules reduced delay and repeated disclosure.	Adopt a signed referral map and purpose-limited information protocol; audit completion without exposing identities.
Stakeholder voice	Participation/inclusion was lowest (M=3.35); parent/CSO adjusted $b = -0.20$ ($p=.003$).	Families and civic actors were informed more often than they influenced plans and reviews.	Give parent, learner, and community representatives defined agenda and monitoring roles with safe feedback loops.

5. Discussion

5.1 Principal findings

The study produced four principal findings. First, collaboration and safety capacity were moderately favorable but not fully institutionalized. Second, domains involving recurring resource commitments, referral completion, and meaningful participation lagged behind joint prevention and disaster readiness. Third, collaboration had a moderate positive association with safety capacity after school and stakeholder covariates were held constant. Fourth, the qualitative scenarios explained the score pattern as a governance-continuity problem: partners could mobilize around events, but everyday coordination remained vulnerable to personal relationships, turnover, access constraints, unclear handoffs, and weak feedback loops. The integrated conclusion was not that another committee was needed. It was that existing mandates needed a shared, testable operating protocol.

The adjusted coefficient was substantively meaningful within a five-point scale: a one-point collaboration increase corresponded to nearly half a point in safety capacity. However, the relationship was deliberately embedded in the generator and could not be interpreted as field confirmation. Its value was methodological. It demonstrated that a school-clustered, multistakeholder design could estimate the hypothesized relationship while protecting against false precision. The ICCs near one-half were particularly consequential; they showed how a nominal sample of 374 could contain far less independent information than an individual-level analysis implied.

5.2 Interpretation through collaborative governance and school safety

The pattern was consistent with collaborative-governance theory. Shared motivation and trust made rapid coordination possible, while joint-action capacity depended on routines, knowledge, leadership, and resources [22,23]. The personal-contacts theme illustrated a productive but unstable form of social capital. Informal relationships could reduce transaction costs during an incident, yet they did not guarantee continuity when personnel changed. The practical goal was therefore not to replace trust with paperwork. It was to translate trusted relationships into role-based procedures, alternates, action records, and institutional memory.

Resource coordination emerged as a bottleneck because interdependence did not eliminate organizational autonomy. Each partner remained accountable to its own mandate, budget, data rules, command structure, and performance system. Collaborative action had to respect those boundaries while making mutual contributions visible [24]. This finding also supported a network-governance interpretation: when a network involved multiple organizations, dispersed services, and variable trust, effectiveness depended on a coordinating arrangement with enough authority and administrative support to monitor network-level work [25]. In Isabela, that arrangement should be anchored to legally existing local bodies rather than improvised as a stand-alone entity.

The difference between prevention scores and referral or participation scores also mattered. Visible activities were easier to schedule, document, and attribute than confidential case management or shared decision-making. Yet school-climate and prevention research suggested that supportive relationships, fair processes, trusted reporting, and sustained program implementation were central to safety [18–21,29–31]. A calendar of seminars, patrols, and drills could therefore coexist with low disclosure confidence or unresolved referrals. Monitoring needed to measure whether systems worked, not merely whether activities occurred.

Comprehensive school safety further required balancing security, child rights, and resilience. The PNP contribution was important for lawful prevention, emergency support, traffic and public safety, and cases requiring police action. It should not shift routine discipline into a law-enforcement frame or expose learners to unnecessary surveillance or criminalization. DepEd retained

responsibility for a protective educational environment; social-welfare, health, disaster-risk, and mental-health actors supplied distinct services; and community participants helped identify risks and test whether systems were trusted. This differentiated partnership was more consistent with the all-hazards and rights-based framework than a narrowly securitized model [1].

5.3 Implications for Isabela's first and second districts

The locale required two governance cautions. First, legislative districts offered a coherent geographic frame for comparison and policy dialogue but possessed no automatic operational authority over schools, municipalities, police stations, or service agencies. District-wide learning could be useful, but implementation decisions had to remain with the competent DepEd and local institutions. Second, uniform checklists could obscure differences in travel time, communications, transport, hazards, and service availability. A common minimum protocol should therefore be paired with locally differentiated referral and continuity arrangements.

A Safe School Coordination Protocol was proposed as the core intervention. The protocol would be endorsed through existing Local School Board and appropriate local disaster-risk, peace-and-order, and child-protection structures, with DepEd participation and clear PNP, social-welfare, health, barangay, parent, learner, and civil-society roles. A small technical working mechanism could maintain the operational products, but it should not duplicate statutory councils. Eligible expenditures would remain subject to the Local Government Code, disaster-risk law, education regulations, procurement requirements, and locally approved plans and budgets. The protocol's value would come from six linked practices rather than from its label.

Table 7. Proposed Safe School Coordination Protocol implementation matrix

Core practice	Accountable lead	Key supporting actors	Minimum evidence	Timing
1. Governance map and authorization	LGU/Local School Board with DepEd	PNP, LDRRMO, social welfare, health, barangays, schools, parent/learner/CSO representatives	Signed role map; primary and alternate focal persons	First 60 days; annual refresh
2. Joint risk and service map	Schools and LDRRMO	PNP, engineering, health, social welfare, barangays, community representatives	All-hazards map; route, transport, and service gaps logged	Before annual planning; update after major change
3. Integrated annual workplan	DepEd/school heads and LGU	All protocol partners	Actions, accountable lead, budget source, deadline, evidence	Annual; quarterly review
4. Referral and information protocol	DepEd child-protection lead and social welfare	PNP WCPD, health/mental-health services, privacy focal persons	Tested contacts; decision tree; receipt and safe-closure checks	Test twice yearly and after turnover
5. Exercises and after-action learning	Schools and LDRRMO	PNP, fire, health, barangays, families and learners	At least one integrated exercise; corrective actions closed	At least annually; hazard-specific cadence
6. Participatory monitoring	Local coordinating mechanism	Parent, learner and CSO representatives; school planning teams	Quarterly dashboard; disaggregated feedback; no identifiable case data	Quarterly; public annual summary

Note. The matrix proposed a coordination minimum, not a transfer of statutory authority. LDRRMO=Local Disaster Risk Reduction and Management Office; WCPD=Women and Children Protection Desk; CSO=civil-society organization. Cadence should be intensified when local risks require it.

The monitoring dashboard should combine implementation, reach, quality, and outcome signals. Implementation indicators could include quarterly meetings completed, assigned actions closed on time, focal-person coverage, and corrective actions completed after exercises. Reach and equity indicators could record which schools received training or service support, transport and referral availability, accessible communication formats, and participation by underserved groups. Quality indicators could include referral acknowledgment time, completion of first-responder orientation, anonymous confidence in reporting channels, and satisfaction with feedback. Outcome monitoring could examine aggregate incident patterns, disruption days, attendance, perceived safety, well-being, and continuity. Counts of reported incidents should never be interpreted alone: an initial rise could reflect improved trust and detection rather than deteriorating safety.

Data governance was an operational safety issue, not an administrative afterthought. The shared dashboard should use aggregated, minimum-necessary data. Named case files should remain within authorized case-management systems, with transfer only for a defined lawful purpose. Meeting minutes should not reproduce sensitive disclosures. Referral monitoring could use a coded

acknowledgment and status field without exposing identities to the full partnership. The protocol should also specify retention, access, breach response, and secure disposal. These controls would support both effective coordination and compliance with privacy and child-protection duties [8,9,15].

Participation required more than attendance. Parent, learner, and community representatives should receive materials early enough to influence decisions, hold defined agenda rights, and be able to submit concerns safely. Schools should report what changed in response to feedback. Learner participation in hazard mapping [11] offered an existing entry point, but participation should extend to protective climate, accessibility, online harms, mental well-being, and the usability of reporting channels. Appropriate safeguarding and adult support remained essential.

6. Conclusion

This transparently mixed-methods study showed how interagency collaboration for safe schools could be conceptualized, measured, analyzed, and translated into governance action in Isabela's first and second legislative districts. The generated pattern indicated that event-based prevention and disaster readiness could appear stronger than the less visible work of resource alignment, referral completion, confidentiality, and participatory oversight. Stronger collaboration was associated with stronger perceived safety capacity, but the coefficient was a test of the proposed analytical architecture rather than a field finding.

The central policy proposition was a Safe School Coordination Protocol embedded in existing local and education governance structures. Its minimum products were a role map, an all-hazards risk and service map, an integrated workplan, a tested referral and information protocol, joint exercises with corrective-action tracking, and participatory monitoring.

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