The notion of schools as “loosely coupled” organizations has been widely discussed in the research literature. Many argue that the loose coupling is either a protective mechanism for schools to buffer external pressure or a barrier for implementing new reforms. Against the backdrop of systemic change and accountability policies in the last 15 years, which focus on tightening the system as the way to improve K-12 schools, I conducted three related studies to empirically test the “loosely coupled” theory by applying two-level hierarchical linear models to nationally representative data in the US.

In the first study I evaluated the “loosely coupled” theory through examining the association between data-informed improvement efforts at the school level and data-informed instruction at the classroom level. Statistically significant associations were identified. However the effect sizes were small, and a very small proportion of variance was explained. In the second study I evaluated the “loosely coupled” theory through examining the association between data-informed improvement efforts at the district and school levels. Statistically significant associations were identified with large effect sizes, and a large proportion of variance was explained. In the third study, I examined whether school performance was attributable to data-informed decision-making at the district,
school, and classroom levels, only one school level data-informed decision making area was statistically significant.

In summary, viewing “data” as a coupling element and “data-informed decision-making” as a coupling mechanism, I found that the K-12 system appears to be “loosely coupled” between the school and classroom levels, but “tightly coupled” between the district and school levels. In other words, the blanket statement of “schools as loosely coupled organizations” is not accurate. Thus, the dominant reform agenda in the last 15 years based on this blanket statement—advocating to tighten the system via curriculum standards, accountability tests, and evaluation as the way to improve the K-12 schools—is called into question. Policy implications are discussed.