

## **ABSTRACT**

*Based on RPP about operation of electronic systems in central and district government (e-Government) chapter 9/2009 which reads every central and district government must provide data center that fit their main tasks and functions. Presidential Regulation 96/2014 on Indonesia broadband plan 2014-2019 stated in order to create the development and utilization national market through synchronization, synergy, and coordination across sectors and regions. Pemerintahan Kabupaten Bandung (Pemkab) created data center and synchronize to the central government. However, at Bandung regent regulation 17/2016 written that Data Center built and managed centrally and used for the benefit of all Regional Work Unit (SKPD). Data center that has been built by the Pemkab should be closed due to 17/2016. However, the losses will arise due to closing the data center has an impact on the functionality of Pemkab. In addition, data on Pemkab must be synced for the realization of 96/2014. In order for data center can be useful for the sustainability of business process, then converted to sub-data-center. Sub-data-center as a temporary data storage before synchronized directly with existing data centers at central government. This sub-data-center uses EN 50600 as the standard for sub-data-center design, and with PPDIOO Life-Cycle Approach methodology in the first three stages of prepare, plan, design. This methodology is suitable for the development of a sustainable data center with the optimization stage for long-term development of data center. The final result of this research is guideline of design data center for development accordance with standard EN 50600-2-2 power distribution which is divided into several classes. In this study, only focuses on class 1 as the foundation for the data center design.*

*Keywords: data center, power distribution, sub data center, EN 50600, PPDIOO Life-Cycle Approach.*