The paper examined the extent to which the University of Zamhia (UNZA) Library was addressing the information technology (IT) sustainability challenges. This was with a view to establishing afeasible IT sustainability model approach that could he adopted by the Library. In this case study, multiple sources of data, including document review, semi-structured interviews and questionnaires, were used to collect data from students, lecturers, librarians, computer centre management and a donor representative. The findings of the study show that most of the IT facilities in the Lihrary were not functioning. This was attributed to such factors as poor funding, lack of support from the university administration, and shortage of staff. The study recommended selling up an automation committee, with a national information policy, and a strategy to reallocate funds to support hardware and software upgrades. In conclusion, the problem of sustainability of IT is an issue that requires concerted effort hy ensuring efficient and effective resource allocation, organisational responsibility and commitment, appropriately scaled technology, cooperation and genuine assistance from donor agencies.