

# [Pacs system solution](https://assignbuster.com/pacs-system-solution/)

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PACS SYSTEM SOLUTION   
The picture archiving and communications system (PACS) is the answer for many of an health care providers multitude of problems with regards to the storage, transmission and also an efficient retrieval system to the growing number of medical images being generated today. If the PACS was not invented, the whole mountain of medical images and records would easily swamp any administrative section of a large hospital. The PACS is a good solution to this problem as it addresses four key areas which are digital replacement of hard-copy records, provides for remote access of the archived records (tele-medicine such as tele-radiology and tele-diagnosis), a digital imaging system that integrates quite easily with other forms of electronic records such as EMR (electronic medical records mandated by the HIPAA Law), radiology information system (RIS) and ultimately, with the larger or overall hospital information system (HIS) as well, and finally, a very good way of dealing with the radiology work-flow management (RWM) concerns too.   
There are several barriers to the rapid adoption of the PACS technology as cited below:   
Cost – this is perhaps the major barrier to the wider diffusion of the adoption of PACS as hospital administrators have to justify the costs involved. When health care systems are doing cost-cutting initiatives to reduce expenses but still raise the quality of services as demanded by a growing activist consumer sector (the patients, the payors, the health insurance firms and also a government increasingly concerned with rising costs), purchase of a PACS systems adds to costs of running a hospital although such a huge investment must be viewed in the longer term such as having higher efficiency, faster remote access, greater accuracy and immediate viewing of these crucial patient laboratory records at user-friendly workstations (NWU, 1992, p. 239).   
Productivity – several studies had shown that an estimated drop of 10% in the physician productivity can occur due to the changes incurred when implementing the new PACS system in an ironic twist, as physicians are the ones supposedly to benefit from it (Neustein, 2010, p. 266). It translates to about $7, 500 lost revenues per physician in a private practice clinic while those working in institutional settings resent the changes to be made in their documentation work-flow although this happens only in initial implementation. To counter this, the U. S. Congress provided new incentives for adoption of an EMR of which PACS is an integral part such as incorporating $17 billion in payments under the Health Information Technology for Economic and Clinical Health Act (HITECH) portion of the $787 billion American Recovery and Reinvestment Act.   
Culture – sometimes, the success or failure of PACS implementation is dependent upon the prevailing corporate culture in a medical institution (SIIM, 2009. p. 401). In particular, it is an endeavor that requires good project management as well as excellent change management so that resistance to change can be overcome by someone who has a good idea of change leadership.   
Some of the factors that can affect the barriers to PACS are enumerated below:   
Competitive Environment – most for-profit hospitals have delayed or deferred a PACS adoption for obvious reasons which is to increase profits by reducing capital outlays. Those who advocate for the PACS must convince and make a strong business case for it (Fonkych & Taylor, 2005, p. 49) in the hospitals board of directors. Additionally, non-profit medical institutions also have a lower adoption rate because of the lack of policy incentives for major HIT or the hospital information technology adoption such as EMR and PACS.   
Lack of Adequate Knowledge – doctors and other medical practitioners sometimes lack the time and incentive to learn new technologies such as PACS (Sharma & Romas, 2010, p. 250).   
Financial – although PACS systems are going down in cost over the years, it is still a bit too costly for most smaller health care provider organizations and more so for those private practice doctor or clinician. Some vendors have offered discounts for those who purchase PACS from them but the lack of adequate capital is a big hindrance to a wider diffusion of the PACS, in addition to the behavioral and technical barriers mentioned earlier (Wager, Lee & Glaser, 2009, p. 52). Some 78% of all U. S. physicians practice in groups of 8 or fewer members only in which the PACS represents a substantial investment on their part in addition to maintenance fees.   
References   
Fonkych, K. & Taylor, R. 2005). The state and pattern of health information technology adoption. CA, USA: The RAND Corporation.   
Neustein, A. (2010). Advances in speech recognition: mobile environments, call centers and clinics. NY, USA: Springer Books.   
Northwestern University or NWU (1992). Computer methods and programs in bio-medicine, Vols. 37-38. MO, USA: Elsevier Science Publishers.   
Sharma, M. & Romas, J. A. (2010). Theoretical foundations of health education and health promotion. MA, USA: Jones & Bartlett Learning.   
Society for Imaging Informatics in Medicine or SIIM (2009). Practical imaging informatics: foundations and applications for PACS professionals. NY, USA: Springer Books.   
Wager, K. A., Lee, F. W. & Glaser, J. P. (2009). Health care information systems: a practical approach for health care management. NY, USA: John Wiley & Sons.