

MONITORING COMPLIANCE TO THE SIXTH INTERNATIONAL PATIENT SAFETY GOALS :MALAYSIA PERSPECTIVE

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Abstract: Hospital A is a private hospital in Malaysia. This hospital was accredited by Joint Commission International in 2013 and part of the requirement is to implement International Patient Safety Goals. Data on the compliance to all the sixth international patient safety goals were collected for 2014 and 2015. For IPSG 1, based on the data collected, the Mean for 2014 was 99% with 1% gap due to staff not aware on the standard practices. For 2015 the Mean was 97.6%, decreased by 1.4% as compared to year 2014 due to the increase number of new staff and incomplete practicing of the two identifiers. For IPSG 2, the Mean for 2014 was 99.6% and the Mean for 2015 was 99.1% which is lower by 0.5 % compared to 2014. The main reason for the lower compliance in 2015 was due to insufficient knowledge among staff and lack of confident in giving recommendation to consultant. For both years of 2014 and 2015, the quality objective of 100% compliance was achieved for IPSG 3 which is related to the establishment and identification of High Alert Medication, storage and preparation, administration and Look Alike and Sound Alike management. Based on the data collected, the compliance to IPSG 4 for both years was 100%. For IPSG 5, based on the data collected, the Mean for 2014 was 75.3% followed by 75.2% in 2015 which is 0.1% lower compared to 2014. The non-compliance were mostly non-clinical staff, which failed to perform hand hygiene practices consistently according to the 5 moment's checklist. In term of IPSG 6, data collected from January to December 2014, the Mean for compliance was only 83.3% due to staff's failure to do re-assessment when there are changes in patient condition. However for year 2015 the Mean was 97.3%, increased by 14% in term of inpatients and outpatients assessment for risk of fall.

Keywords: international patient safety goals, Joint Commission International, monitoring compliance, Mean

1. INTRODUCTION

Hospital A is a private hospital in Malaysia. This hospital was accredited by Joint Commission International in 2013 and part of the requirement is to implement International Patient Safety Goals. International Patient Safety Goals (IPSG) was implemented to promote specific improvement in patient safety. The goals highlighted problematic areas in health care and describe evidence-and expert-based consensus solutions to these problems. Recognizing that sound system design is intrinsic to the delivery of safe, high quality health care, the goals generally focus on system wide solutions, wherever possible (JCI Accreditation standards for hospital 4th edition 2011). Hospital is suppose to be a safe place for you when you are sick but sometime the opposite happen. Based on the report produced by Department of Health and Human Services of USA in 2010, the deaths of 180,000 hospital patients a year are contributed by infections, surgical mistakes and other medical harm. Another 1.4 million are seriously hurt by their hospital care. Patients should not be harmed by the care that is intended to help them, and they should remain free from accidental injury which is in line with was reported by The Institute of Medicine (IOM) stating To Err is Human: Building a Safer Health System. According to the report in 2001 by the IOM Crossing the Quality Chasm, patient safety is one of the essential components of high-quality health care. Safety is the main issues in diagnosis, treatment and care for every patient, carer and family members and it is the heart of the delivery of healthcare. Weak governance structures, poor communication processes, failure to develop clinical audit, poor working relationship between management and clinician, poor team work, lack of structured incident reporting systems, inconsistent analysis of adverse events and failure to participate in continuing education are some of the issues that lead to adverse events. Planning and organising, positive attitudes and values towards safety and quality and using data as evidence based practices are some of the elements in the Governance. The fundamental important criteria for the delivery of a safe system is leadership and accountability and there must be the right balance between organization and governance of healthcare system. Every one is responsible to ensure patient safety in the system of healthcare and without effective leadership, individuals may lack motivation in their practice and will later become complacent. Positive culture in the organization is characterised by open communication, shared perception, mutual trust on the importance of safety must be created by leaders. Accountability must start from individual,

team and system level and the top management must take the lead in ensuring system is in place and followed by every healthcare players in the organization. Continuing education is a must for every one in the system because Healthcare professional can no longer be considered as trained for life. A system of life long learning must be mandated followed by credentialing, privileging and competency assessment. Specific education and training are also required for professional where the program should include a specific module on patient safety. Another important issues that need to be look into seriously is recruitment of healthcare professional where capturing information in relation to previous competency or conduct is very important for the management before making any decision to recruit the employee.

To make health care safer, development of viable solutions can be initiated by identifying common factors which contribute to error so that fundamental laws and design faults in the system must be looked into as well as unusual and one-off events. Unfortunately response from many organizations are slow in this issue. It can be a complex task to understand and to classify contributing factors due to the wide variety of inputs that lead to the final error needs to be made available and accessible to the experts and all health care workers. Successful organization will have internal systems that are ready to deal with errors and will request for external assistance when needed and promote a culture of safety in that organization. To deliver safe and high quality care, evidence based practise is the critical element of healthcare system. It can be further added through the strategic and systemic approach supported by sufficient resources. However attention must be given to ensure the implementation of evidence based guideline. Healthcare provider should be engaged in clinical audit as part of the monitoring measures. It should become the heart of the clinical practise. Continuing evaluation and improvement by healthcare professional working towards delivery of safe, high quality care for patients is called clinical audit. The clinical audit is one of the principle methods used to monitor clinical quality and results and it should be viewed as the essential tools to achieve quality services and ensuring patient safety.

Safe patient care is fundamental to quality health-care services. Safety means “being safe, exemption from hurt or injury, freedom from danger” (Oxford English Dictionary, 2nd Edition 2002). Referring to The Canadian Patient safety Dictionary (2003) , patient safety has been defined as “the reduction and mitigation of unsafe acts within the health care system, as well as through the use of best practices shown to lead to optimal patient outcomes. “One way to measure patient safety is to examine the risk of adverse events “unexpected and undesired incidents directly associated with the care or services provided to the patient.”

Much of the work and efforts had defined patient safety practices. The ultimate aim is to prevent harm and focused on quality patient’s care given. All healthcare workers are critical to the surveillance and coordination that reduce such adverse outcomes.

Another issue in providing safer care is the monitoring of adverse event. WHO defined adverse event as an incident which results in harm to a patient and this events occur at rates between 4% and 16% of hospitalisations in the United State, the United Kingdom and Australia. An effective and patient-centred approach must be taken by the management so that monitoring can be done accordingly through reporting system which can be done both by voluntary and mandatory reporting. Voluntary system will rely on strong educational initiatives, institutional supports and professional codes of conduct to encourage, promote and support healthcare professional to report. The mandatory reporting systems seek to make healthcare providers accountable for serious mistakes and by providing disincentives such as sanctions for the continuation of unsafe practices.

The challenges to balance between the formal and informal strategies to improve patient safety and quality of care is quite real. Long term planning in term of legislative, organization and structural reform is required. The long term strategies are the most effective ways to achieve the objective.

Patient safety is a new healthcare discipline that emphasizes the reporting, analysis, and prevention of medical error that often leads to adverse healthcare events. The frequency and magnitude of avoidable adverse patient events was not well known until the 1990s, when multiple countries reported staggering numbers of patients harmed and killed by medical errors. The World Health Organization calls patient safety an endemic concern after recognizing that healthcare errors impact 1 in every 10 patients around the world. Indeed, patient safety has emerged as a distinct healthcare discipline supported by an immature yet developing scientific framework. There is a significant transdisciplinary body of theoretical and research literature that informs the science of patient safety. The resulting patient safety knowledge continually informs improvement efforts such as: applying lessons learned from business and industry, adopting innovative technologies, educating providers and consumers, enhancing error reporting systems, and developing new economic incentives.

Patient safety is a serious global public health issue and in developed countries 10 percent of patients is harmed while receiving hospital care. However in developing countries the probability of patients being harmed in hospitals is higher than in industrialized nations. In some developing countries the risk of health care-associated infection is as much as 20 times higher than in developed countries. In recent years, countries have

increasingly recognized the importance of improving patient safety. In 2002, WHO Member States agreed on a World Health Assembly resolution on 10 patient safety issues consisting of improving patient safety, harm caused by a range of errors, risk of health care associated infection, hand hygiene to reduce health care associated infection, safety of medical equipment, infection due to reused needles, surgical safety, the economic benefit of improving patient safety, perceived higher risk industries had better safety record compared to health care and patient experience and their health.

The failure to identify patients correctly continues to result in medication errors, transfusion errors, testing errors, wrong person procedures, and the discharge of infants to the wrong families. Effective communication which is timely, accurate, complete, unambiguous, and understood by the recipient will reduce errors and results in improved patient safety. Communication can be electronic, verbal, or written. The most error-prone communications are patient care orders given verbally and those given over the telephone, when permitted under local laws or regulations. Another error-prone communication is the reporting back of critical test results, such as the clinical laboratory telephoning the organization to report the results of a critical lab value. High-alert medications are those medications involved in a high percentage of errors and/or sentinel events, medications that carry a higher risk for adverse outcomes, as well as look-alike, sound-alike medications. In health care organizations, wrong-site, wrong-patient surgery, wrong –procedure, is an alarmingly common occurrence. Ineffective or inadequate communication between members of the surgical team, lack of patient involvement in site marking, and lack of procedures for verifying the operative site result in those errors. Frequent contributing factors are inadequate patient assessment, inadequate medical record review, a culture that does not support open communication among surgical team members, problems related to illegible handwriting, and the use of abbreviations. Healthcare-associated infections (HAIs) can be serious and even deadly for patients. Patients are expecting care and treatment, not additional illness and complications. The Centers for Disease Control and Prevention estimates that 1 in 20 hospitalized patients develop an HAI. In the United States, an estimated 1.7–2 million people per year develop an HAI, and nearly 100,000 die (Klevens, R.M, 2002). A significant number of falls result in death or severe or moderate injury, at an estimated cost of £15 million per annum for immediate healthcare treatment alone (NPSA, 2007). Fall as up to 90% of older patients who fracture their neck of femur fail to recover their previous level of mobility or independence (Murray, Cameron and Cumming, 2007). International patient safety goals consist of six goals as follows: IPSPG.1 Identify Patients Correctly :This IPSPG is to improve accuracy of patient identification in ensuring patient safety; IPSPG.2 Improve Effective Communication: It is to provide patient safety through effective communication among health care professionals by providing accurate information about patient care during verbal or telephone communication, reporting critical test results and handover communications; IPSPG.3 Improve the Safety of High-Alert Medications: This IPSPG is to identify high alert medications for all healthcare providers involved in the prescribing, dispensing and administration of these medications. Aim to promote the safe storage, handling and administration of high alert medications and safe use of concentrated electrolytes; IPSPG 4: Ensure correct site, correct-procedure, correct patient-surgery: It is to promote patient safety by providing guidelines for verification of correct site, procedure and patient. Ensure a time-out procedure conducted and all documents and medical technology needed are on hand, correct and functional; IPSPG.5 Reduce the Risk of Health Care–Associated Infections: It is to improve and maintain high standards of hand hygiene compliance aim to reduce the risk of health care-associated infections (HAI) and IPSPG.6 Reduce the Risk of Patient Harm Resulting from Falls: This is to build up awareness among the healthcare providers, patients and visitors on the management of those who are at risk of falling and those who have fallen aim to reduce the risk of patient harm resulting from falls.

II. OBJECTIVE

- i. To tabulate all data that had been collected for year 2014 and 2015
- ii. To analyse all data for 2014 and 2015 by looking at the compliance rate
- iii. To develop trending by comparing data collected in 2014 with 2015
- iv. To find out what are the reasons for not complying to the IPSPG

III. METHODOLOGY

Retrospective study was conducted for a period of two years from 2014 to 2015. All data collected will be tabulated based on various types of IPSPG. A trending will be done to compare the data collected in 2014 again data collected in 2015. Data will be analysed to find out reason for not complying to the IPSPG. Analysis will also be done using the Mean and Standard deviation for each indicator.

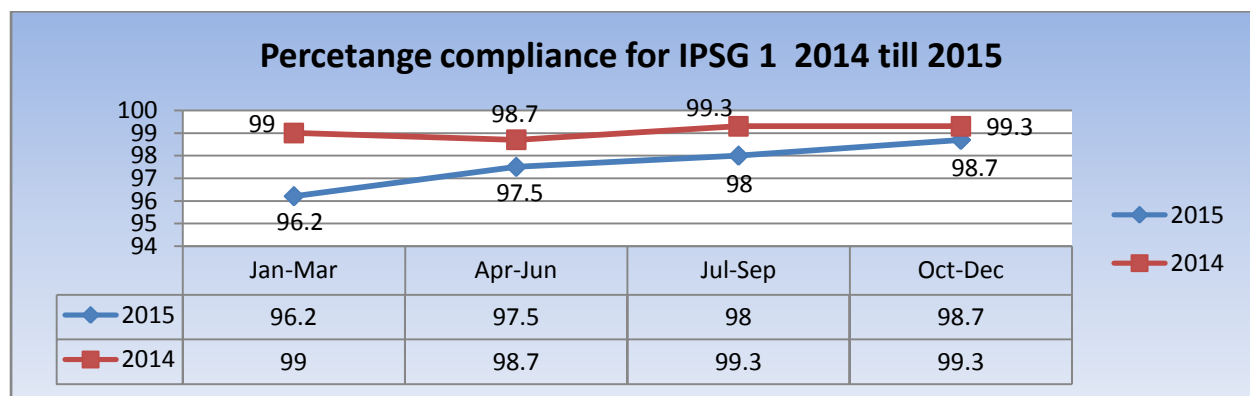
IV. RESULTS

Percentage of the compliance for all 6 goals as collected:

IPSG1- Identify Patients Correctly

Overall percentage for nursing and nursing support services

Month	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Average %
Percentage of compliance	2015	96.2%			97.5%			98%			98.7%		97.6%
	2014	99%			98.7%			99.3%			99.3%		99%



	MEAN	VARIANCE	STANDARD DEVIATION
2015	97.6	0.84	0.92
2014	99.1	0.06	0.25

IPSG 2- Improve Effective Communication

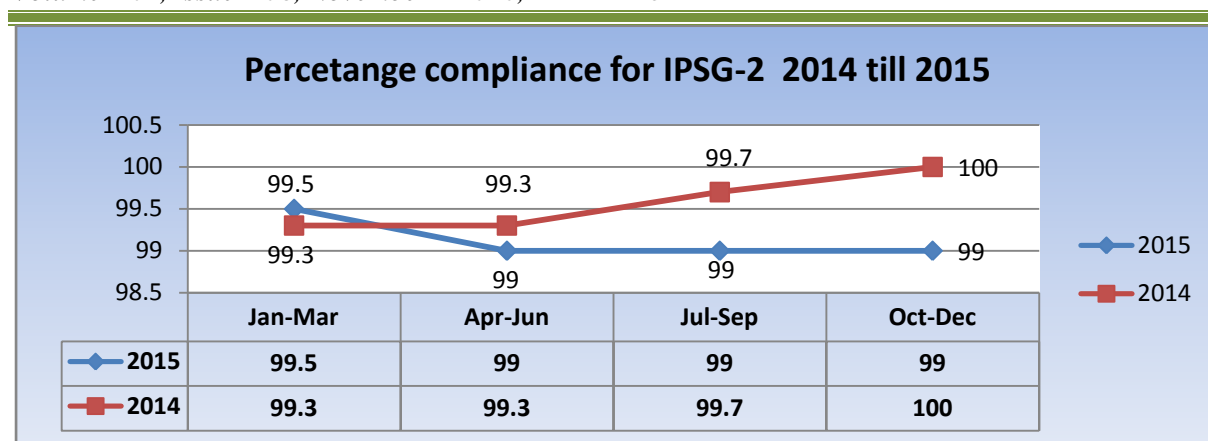
Overall percentage for nursing and nursing support services

Table 1:

Criteria	Compliance (%)	
	2014	2015
Before calling the doctor and preparation	100	100
Situation -identification of staff and patient	100	100
Background - inform about medical history of patient	99	99
Assessment -inform patient condition	100	100
Recommendation -necessary suggestion for patient care	98.8	96
Overall percentage	99.6%	99%

Table 2:

Month	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Average %
Percentage of compliance	2015	99.5%			99%			99%			99%		99%
	2014	99.3%			99.3%			99.7%			100%		99.6%

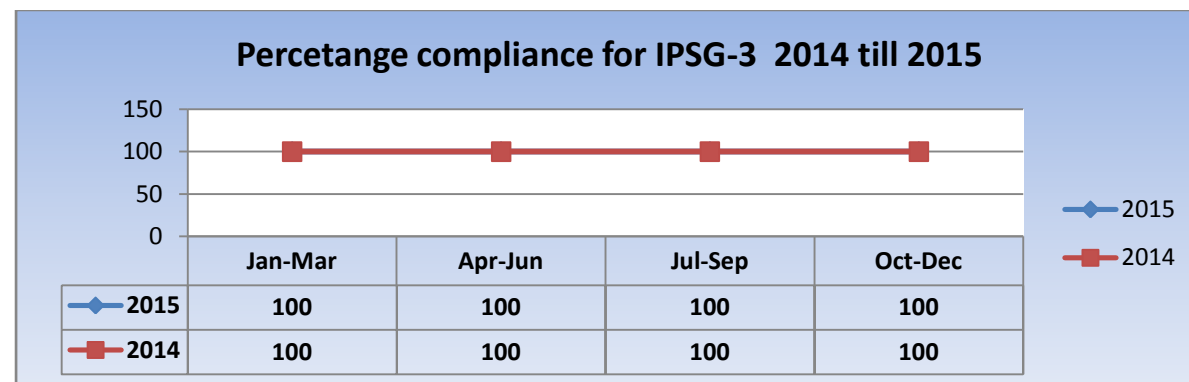


	MEAN	VARIANCE	STANDARD DEVIATION
2015	99.1	0.05	0.22
2014	99.6	0.09	0.30

IPSG 3- Improve the Safety of High-Alert Medications

Audit conducted by Pharmacists and pharmacy assistant in all wards or services which are keeping medication as floor stock

Month	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Percentage of compliance	2015	100%			100%			100%			100%	
	2014	100%			100%			100%			100%	

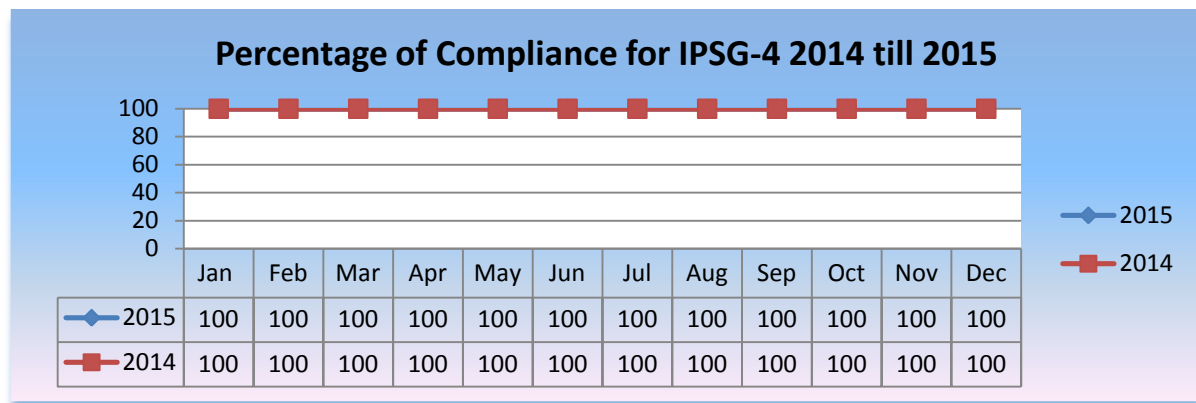


	MEAN	VARIANCE	STANDARD DEVIATION
2015	100	0	0
2014	100	0	0

IPSG 4- Ensure correct site, correct-procedure, correct patient-surgery

Result of the audit conducted for the five required steps- consent form, patient identification, site marking, time out and sign out.

Month	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Percentage of compliance	2015	100	100	100	100	100	100	100	100	100	100	100
	2014	100	100	100	100	100	100	100	100	100	100	100



	MEAN	VARIANCE	STANDARD DEVIATION
2015	100	0	0
2014	100	0	0

IPSG 5- Reduce the Risk of Health Care–Associated Infections

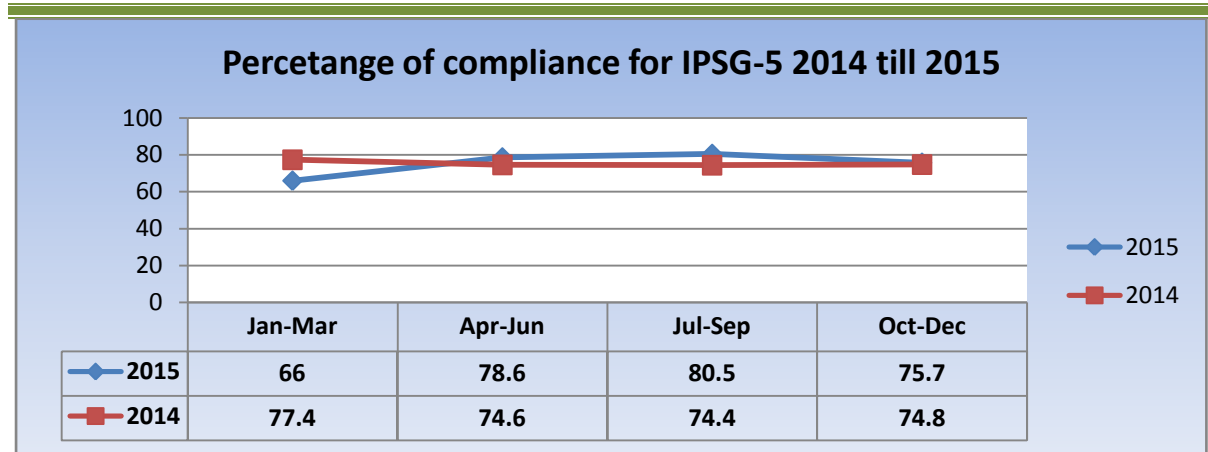
The audit was conducted among all healthcare workers based on the 5 moments of hand hygiene requirement.

Table 1:

category	Compliance (%)	
	2014	2015
Doctors	75	72.7
Nurses	79	77
Clinical Staff	77	77.5
Non-clinical staff	59	65.8
Students	86	83.5
Overall percentage	75.2%	75.3%

Table 2:

Month		Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Average %
Percentage of compliance	2015	66%			78.6%			80.5%			75.7%			75.2%
	2014	77.4%			74.6%			74.4%			74.8%			75.3%



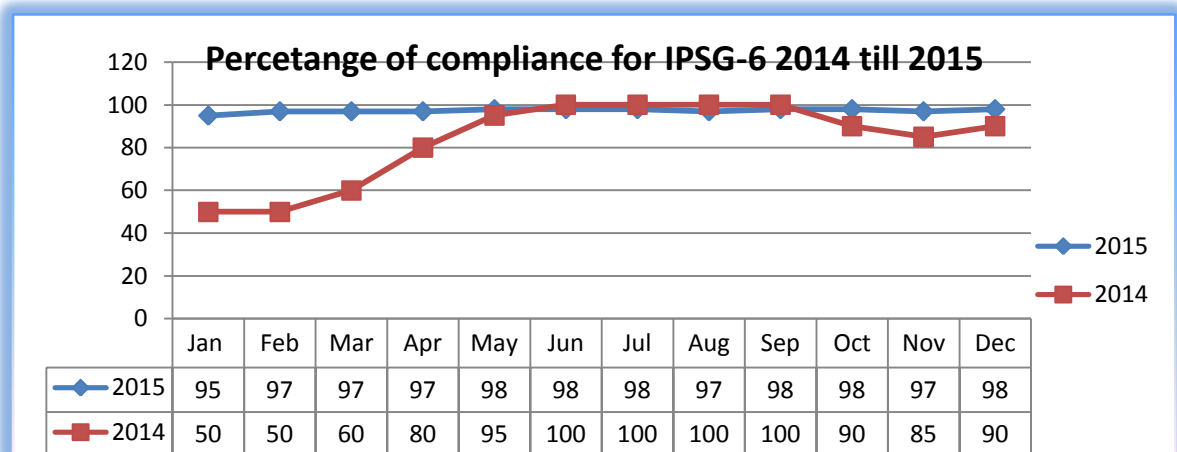
	MEAN	VARIANCE	STANDARD DEVIATION
2015	75.2	31.14	5.58
2014	75.3	1.49	1.22

IPSG 6-Reduce the Risk of Patient Harm Resulting from fall

The audit conducted was to assess the level of knowledge and compliance among the healthcare workers on fall prevention in this hospital

TABLE 1: PERCENTAGE OF COMPLIANCE ON IPSG-6 2014-2015

Month	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Average %
2015	95	97	97	97	98	98	98	97	98	98	97	98	97.3
2014	50	50	60	80	95	100	100	100	100	90	85	90	83.3



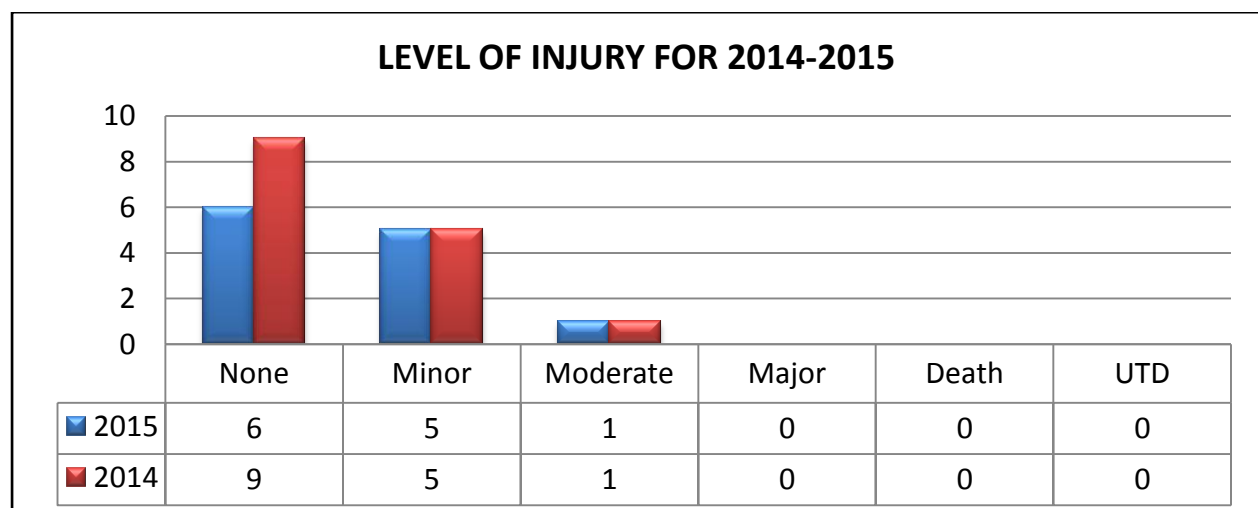
	MEAN	VARIANCE	STANDARD DEVIATION
2015	97.33	0.72	0.9
2014	83.33	319.9	17.9

TABLE 2: TOTAL NUMBER OF FALLS AND INJURY 2014 - 2015

YEAR MONTH	2015		2014	
	Total of fall	No of Injury	Total of Fall	No of Injury
January	1	1	1	1
February	0	0	0	0
March	0	0	0	0
April	2	0	2	1
May	1	1	3	2
June	3	2	2	0
July	1	0	2	1
August	1	1	2	0
September	0	0	2	0
October	0	0	0	0
November	2	1	1	1
December	1	0	0	0
Total	12	6	15	6

TABLE 3: TOTAL OF FALLS WITH LEVEL OF INJURY 2014 - 2015

	2015	2014	VARIANCE (%)
None	6	9	33.3%
Minor	5	5	0%
Moderate	1	1	0%
Major	0	0	0%
Death	0	0	0%
Total	12	15	20%



V. DISCUSSION

IPSG 1

Based on the data collected, the Mean for 2014 was 99% with 1% gap due to staff not aware on the standard practices. For 2015 the Mean was 97.6%, decreased by 1.4% as compared to year 2014 due to the increase number of new staff and incomplete practicing of the two identifiers. Year 2014 had a smaller Variance compared to year 2015 followed by a smaller Standard deviation in 2014 (0.25) compared to 2015 (0.92). Therefore data for 2014 is more consistent compared to 2015. As highlighted by the Joint Commission international in WHO Collaborating Centre for Patient Safety Solutions (Patient Safety Solutions, Volume 1, solution 2, 2007), Patient misidentification was cited in more than 100 individual root cause analyses by the United States Department of Veterans Affairs (VA) National Centre for Patient Safety from January 2000 to March 2003 (2). The failure to correctly identify patients continues to result in medication errors, transfusion errors, testing errors, wrong person procedures, and the discharge of infants to the wrong families. Fortunately, available interventions and strategies can significantly reduce the risk of patient misidentification. The major areas where patient misidentification can occur include drug administration, phlebotomy, blood transfusions, and surgical interventions. The trend towards limiting working hours for clinical team members leads to an increased number of team members caring for each patient, thereby increasing the likelihood of hand-over and other communication problems (Thomas, P, 2004). Because patient misidentification is identified as a root cause of many errors, the Joint Commission, in the United States of America have listed improving patient identification accuracy as the first of its National Patient Safety Goals introduced in 2003, and this continues to be an accreditation requirement (patientsafety.org). While in some countries wristbands are traditionally used for identifying hospitalized patients, missing bands or incorrect information limit the efficacy of this system. Colour coding of wristbands facilitates rapid visual recognition of specific issues, but the lack of a standardized coding system has led to errors by staff providing care at multiple facilities (www.psa.state,2006). In order to improve the compliance, the Management will continue to conduct awareness for all staff, to perform regular audit and to share the Root Cause Analysis of any incidences. The importance of correct identification will be displayed in screen server, notice board, book mark and pocket book. Patients are educated to participate in the process.

IPSG 2

From the data collected, the Mean for 2014 was 99.6% and the Mean for 2015 was 99.1% which is lower by 0.5 % compared to 2014. The main reason for the lower compliance in 2015 was due to insufficient knowledge among staff and lack of confidence in giving recommendation to consultant. However the Variance and Standard deviation for 2015 are better than 2014 where the Variance in 2015 is 0.05 compared to 0.09 in 2014. The Standard deviation for 2015 is 0.22 compared to 0.30 in 2014. Therefore the data for 2015 is more uniform compared to 2014.

The gaps in communication can cause serious breakdowns in the continuity of care, inappropriate treatment, and potential harm to the patient ((Patient Safety Solutions, Volume 1, solution 3, 2007). Based on the sentinel events reported to the Joint Commission in the United States of America between 1995 and 2006, of the 25,000 to 30,000 preventable adverse events that led to permanent disability in Australia, 11% were due to communication issues. Thus, Hand-over communication relates to the process of passing patient-specific information from one caregiver to another, from one team of caregivers to the next, or from caregivers to the patient and family for the purpose of ensuring patient care continuity and safety. Therefore it is necessary to incorporate the repeat-back and read-back steps as part of the hand-over process in order to provide safe care to the patient. Errors in healthcare are of concern when they lead to actual or potential adverse outcomes for patients. Current research indicates that ineffective communication among health care professionals is one of the leading causes of medical errors and patient harm. A review of reports from the Joint Commission reveals that communication failures were implicated at the root of over 70 percent of sentinel events. When asked to select contributing factors to patient care errors, nurses cited communication issues with physicians as one of the two most highly contributing factors, according to the National Council of State Boards of Nursing reports. In a study of 2000 health care professionals, the Institute for Safe Medication Practices (ISMP) found intimidation as a root cause of medication error; half the respondents reported feeling pressured into giving a medication, for which they had questioned the safety but felt intimidated and unable to effectively communicate their concerns. Joint Commission's Board of Commissioners has reviewed 89 cases related to medication errors. Medication errors are one of the most common causes of avoidable harm to patients in health care organizations. A study was conducted by the Institute for Safe Medication Practices (ISMP) during 1995 and 1996 to determine the drugs and situations most likely to cause harm to patients. Approximately 161 health care organizations submitted data on serious errors that had taken place during this period. The results of the study showed that a

majority of medication errors resulting in death or serious injury were caused by a specific list of medications. Medications that have the highest risk of causing injury when misused are known as high-alert medications. The top five high-alert medications identified by the ISMP study are insulin; opiates and narcotics; injectable potassium chloride (or phosphate) concentrates (Sentinel Event Alert, Issue 1); intravenous anticoagulants (heparin); and sodium chloride solutions above 0.9 percent.

IPSG 3

For both year of 2014 and 2015, the quality objective of 100% compliance was achieved for the establishment and identification of High Alert Medication, storage and preparation, administration and Look Alike and Sound Alike management.

According to the journal of American Nurses Association (Preventing high-alert medication errors in hospital patients, 2015 volume 10, no. 5), mistakes involving medications are among the most common healthcare errors. Medication errors lengthen hospital stays, increase inpatient expenses, and lead to more than 7,000 deaths annually in the United States. High-alert medications (HAMs) have risk of significant harm if the wrong route is chosen or a system failure occurs. A study evaluating adverse drug events found that high-alert medications accounted for 48 percent of the events. The Institute of Safe Medical Practices identifies the top high-alert medications to be insulin, opioids, injectable potassium chloride (or phosphate), intravenous anticoagulants (heparin), and sodium chloride solutions above 0.9 percent, due to both common use and significance of associated harm. Other high-alert medications include chemotherapeutic agents and sedatives. From 1997 to 2007, 9.3 percent of all hospital sentinel events were medication-related, and anticoagulants made up 7.2 percent of medication events. Unfractionated heparin was the anticoagulant most frequently involved in these events. Administration errors (e.g., dosing and timing), omission, and prescribing errors constituted approximately 70 percent of heparin errors. Mistakes involving medications are among the most common healthcare errors. Medication errors lengthen hospital stays, increase inpatient expenses, and lead to more than 7,000 deaths annually in the United States. Each error costs an estimated \$2,000 to \$8,750 (institute of safe medical practices). Between June 2004 and April 2009, Pennsylvania healthcare facilities submitted 2,611 event reports involving medication errors in labour and delivery units. Analysis reveals that the most common medication error event type associated with this area is dose omission (22.5%), followed by wrong drug (10.7%). Further analysis showed that 46.4% of wrong-dose/over dosage errors and 55.2% of wrong-rate errors involved high-alert medications.

IPSG 4

Based on the data collected, the compliance to IPSG 4 for both years was 100%.

The Joint Commission (JC) has discovered 278 cases of wrong-site surgeries in the sentinel events reported from 1995 to 2003. Of these, 58% of the cases were wrong-side surgeries, 12% were wrong patients, and 10% were wrong procedures (Wong DA, 2006; Ebraheim NA, 1999). The analysis revealed that the 12% of all wrong-site surgeries occurred in the institutions where 2 out of 3 items were carried out, and these 3 items were: patient verification; surgical site marking and time-out. On the other hand, wrong-site surgeries did not occur in the institutions where all 3 items were carried out. It was also reported by the Joint Commission that a total of 1215 sentinel events for wrong person, wrong-site and wrong surgery for the period 2004 till 2015 (National patient safety goals: Universal Protocol-Marking the Procedure Site, 2016). It also considers wrong-site, wrong-procedure and wrong-person surgery to be “never events”, which means the events that are completely preventable and should never occur.

IPSG 5

Based on the data collected, the Mean for 2014 was 75.3% followed by 75.2% in 2015 which is 0.1% lower compared to 2014. The non-compliance were mostly non-clinical staff, which failed to perform hand hygiene practices consistently according to the 5 moment's checklist. The Variance for 2014 is 1.49 compared to 31.14 for 2015 whereas the Standard deviation for 2014 is 1.22 compared to 5.58 for 2015. Therefore from this data we can see that there is a big variation in term of data collected for 2015 compared to 2014.

In response to the realization of the magnitude of the problem, consumer advocacy groups, federal and state governments, and professional societies have stepped up pressure to make reduction of HAIs a national priority. The Centres for Medicare and Medicaid Services have engaged in “payment reform” in the battle against HAIs and have ceased reimbursing hospitals for expenses related to certain HAIs. By placing that economic burden on the shoulders of hospitals, the Centres for Medicare and Medicaid Services have given hospitals a very concrete incentive to enhance efforts to prevent HAIs. In December 2008, the European Union declared HAI prevention a top policy priority. In the United States, national and state consumer groups have raised public and media

awareness of both HAIs and multidrug-resistant organisms. Prevention of HAI has become a major patient safety initiative; indeed, the 2 objectives are inextricably linked, both within and outside healthcare settings (Gerberding, 2002). Practicing hand hygiene is a simple yet effective way to prevent infections. Cleaning your hands can prevent the spread of germs, including those that are resistant to antibiotics and are becoming difficult, if not impossible, to treat. Therefore improvement in health-care workers' perception and knowledge about the importance of health care-associated infection and hand hygiene are vital (CDC, 2015). It is difficult to aim for the complete compliance for hand hygiene in the short term, we should establish the baseline aimed for a sustainable, month by month, year-on-year improvement (WHO, 2016). The Variance for 2014 is 1.49 compared to 31.14 for 2015 whereas the Standard deviation for 2014 is 1.22 compared to 5.58 for 2015. Therefore from this data we can see that there is a big variation in terms of data collected for 2015 compared to 2014.

IPSG 6

Based on table 1, From January to December 2014 the Mean for compliance was only 83.3% due to staff's failure to do re-assessment when there are changes in patient condition. However for year 2015 the Mean was 97.3%, increased by 14% in terms of inpatients and outpatients assessment for risk of fall.

Table 2 and 3, represent the number of injury related to fall in 2015, of which out of 12 cases, there were 6 injuries: 5 minor injuries and 1 moderate injury with simple fracture at finger (50% injuries). For 2014, out of 15 cases of fall, 6 cases recorded 5 minor injuries and 1 moderate injury with laceration wound at forehead (40% injuries). The percentage of injury for both years was comparable to the international benchmarking of 30 to 51% of falls in hospitals resulting in some injury (Journal of the American Nurses Association– Hospital-Based Fall Program Measurement and Improvement in High Reliability Organizations, May 2013). Therefore, appropriate fall prevention and interventions not only can help in reducing length of stay and reduced hospitalization costs and burden for patients and families.

Setting a target helps break a mindset where falls are seen as inevitable, but it is important to strike a balance between being ambitious and being realistic. Most of the research studies took some time to see any impact from the changes they made, and only reduced falls by an average of 18% (Oliver et al. 2007). Falls and fall injuries in the hospital setting are serious concerns for patients, families, and hospital administrators. Falls among hospitalized patients occur frequently, and some repeatedly. Of those who fall, 28% have bruises and minor injuries, 11.4% have severe soft tissue wounds, and 5% have fractures and around 2% have head trauma, which can in turn lead to subdural haematoma, long-term disability, or death (Coussement et al., 2008; Healey, Oliver, Milne, & Connelly, 2008). Even in a 'minor' injury, functional impairment, pain and distress can occur (Clough-Gorr et al., 2008). Patients who fall may have to stay in the hospital longer, go to a rehab unit or nursing home, and many incur additional bills (Chen et al., 2008; Tinetti, Allore, Araujo, & Seeman, 2005; van Helden et al., 2008). Wide variability in fall rates are reported in the literature, ranging from 2.2 to 25.0 falls per 1,000 patient days (Center for Disease Control, 2007; Davison & Marrinan, 2007).

VI. CONCLUSION

Data were collected for two years from 2014 to 2015 to monitor the compliance among staff to the sixth International patient safety goals. For IPSG 1, the Mean for 2014 was 99% with 1% gap due to staff not aware of the standard practices and for 2015 the Mean was 97.6%, decreased by 1.4% as compared to year 2014 due to the increase number of new staff and incomplete practicing of the two identifiers. For IPSG 2, the Mean for 2014 was 99.6% and the Mean for 2015 was 99.1% which is lower by 0.5 % compared to 2014. For both years of 2014 and 2015, the quality objective of 100% compliance was achieved for IPSG 3 which is related to the establishment and identification of High Alert Medication, storage and preparation, administration and Look Alike and Sound Alike management. The compliance to IPSG 4 for both years was 100%. For IPSG 5, based on the data collected, the Mean for 2014 was 75.3% followed by 75.2% in 2015 which is 0.1% lower compared to 2014. The non-compliance were mostly non-clinical staff, which failed to perform hand hygiene practices consistently according to the 5 moment's checklist. In terms of IPSG 6, data collected from January to December 2014, the Mean for compliance was only 83.3% due to staff's failure to do re-assessment when there are changes in patient condition. However for year 2015 the Mean was 97.3%, increased by 14% in terms of inpatients and outpatients assessment for risk of fall.

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