



Adverse Drug Event (ADE) – Anti-Coagulation Usage Measure Definition Sheet

Data Definition – Percent of Patients Receiving Warfarin with INR >5

Numerator: Number of patient events with an INR >5 after any warfarin administration (for patients cared for in an inpatient area). A patient that has multiple elevated INRs will be counted as one event until it drops below 3.5 and rises above 5 again.

Denominator: Number of patients (cared for in an inpatient area) on warfarin.

Data Submission

1. Input data into the WSHA Quality Benchmarking System (QBS) at the following [link](#). Current users may log in with their QBS credentials. If you need access to QBS, contact Decision Support at decisionsupport@wsa.org.
2. Baseline data: January – December 2012.
3. Ongoing: Monthly data to be submitted to QBS by 45 days after the end of the prior month.

Data Month	Submit By	Data Month	Submit By
January	March 15 th	July	September 15 th
February	April 15 th	August	October 15 th
March	May 15 th	September	November 15 th
April	June 15 th	October	December 15 th
May	July 15 th	November	January 15 th
June	August 15 th	December	February 15 th

Inclusion Criteria

Patients who are admitted to hospital bed, regardless of status (e.g. include observation, rehab and swing bed patients).

Exclusion Criteria

1. Exclude Emergency Department readings.
2. Exclude all patients with liver failure diagnosis. (**See excluded diagnoses listed below**). This exclusion can be optional for facilities that have a limited population of these patients.
3. Exclude patients given argatroban.

Optional Excluded Diagnoses: See Table

Opioid Exclusion Codes: ICD Diagnosis Code Crosswalk Mapping

ICD-9 Dx Code	ICD-9 Dx Code Description	ICD-10 Dx Code	ICD-10 Dx Code Description
070.0	Viral hepatitis A with hepatic coma	B15.00	Hepatitis A with hepatic coma
070.1	Viral hepatitis A without mention of hepatic coma	B15.90	Hepatitis A without hepatic coma
070.41	Acute hepatitis C with hepatic coma	B17.11	Acute hepatitis C with hepatic coma
070.42	Hepatitis delta without mention of active hepatitis B disease with hepatic coma	B17.00	Acute delta-(super) infection of hepatitis B carrier
070.43	Hepatitis E with hepatic coma	B17.20	Acute hepatitis E
070.44	Chronic hepatitis C with hepatic coma	B18.20	Chronic viral hepatitis C
070.49	Other specified viral hepatitis with hepatic coma	B17.80	Other specified acute viral hepatitis
070.6	Unspecified viral hepatitis with hepatic coma	B19.00	Unspecified viral hepatitis with hepatic coma
070.70	Unspecified viral hepatitis C without hepatic coma	B19.20	Unspecified viral hepatitis C without hepatic coma
070.71	Unspecified viral hepatitis C with hepatic coma	B19.21	Unspecified viral hepatitis C with hepatic coma
070.20	Viral hepatitis B with hepatic coma, acute or unspecified, without mention of hepatitis delta	B16.20	Acute hepatitis B without delta-agent with hepatic coma
		B19.11	Unspecified viral hepatitis B with hepatic coma
070.21	Viral hepatitis B with hepatic coma, acute or unspecified, with hepatitis delta	B16.00	Acute hepatitis B with delta-agent with hepatic coma
070.22	Viral hepatitis B with hepatic coma, chronic, without mention of hepatitis delta	B18.10	Chronic viral hepatitis B without delta-agent
070.23	Viral hepatitis B with hepatic coma, chronic, with hepatitis delta	B18.00	Chronic viral hepatitis B with delta-agent
070.9	Unspecified viral hepatitis without mention of hepatic coma	B19.90	Unspecified viral hepatitis without hepatic coma
070.30	Viral hepatitis B without mention of hepatic coma, acute or unspecified, without mention of hepatic coma	B16.90	Acute hepatitis B w/o delta-agent and without hepatic coma
		B19.10	Unspecified viral hepatitis B without hepatic coma
070.31	Viral hepatitis B without mention of hepatic coma, acute or unspecified, with hepatitis delta	B16.10	Acute hepatitis B with delta-agent without hepatic coma
070.32	Viral hepatitis B without mention of hepatic coma, chronic, without mention of hepatitis delta	B18.10	Chronic viral hepatitis B without delta-agent
070.33	Viral hepatitis B without mention of hepatic coma, chronic, with hepatitis delta	B18.00	Chronic viral hepatitis B with delta-agent

ICD-9 Dx Code	ICD-9 Dx Code Description	ICD-10 Dx Code	ICD-10 Dx Code Description
070.51	Acute hepatitis C without mention of hepatic coma	B17.10	Acute hepatitis C without hepatic coma
070.52	Hepatitis delta without mention of active hep B disease or hepatic coma	B17.00	Acute delta (super) infection of hepatitis B carrier
070.53	Hepatitis E without mention of hepatic coma	B17.20	Acute hepatitis E
070.54	Chronic hepatitis C without mention of hepatic coma	B18.20	Chronic viral hepatitis C
070.59	Other specified viral hepatitis without mention of hepatic coma	B17.80	Other specified acute viral hepatitis
		B18.80	Other chronic viral hepatitis
		B18.90	Chronic viral hepatitis, unspecified
153.0	Hepatic flexure	C183	Malignant neoplasm of hepatic flexure1
153.1	Transverse colon	C18.4	Malignant neoplasm of transverse colon
153.2	Descending colon	C18.6	Malignant neoplasm of descending colon
153.3	Sigmoid colon	C18.7	Malignant neoplasm of sigmoid colon
153.4	Cecum	C18.04	Malignant neoplasm of cecum
153.5	Appendix	C18.1	Malignant neoplasm of appendix
153.7	Splenic flexure	C18.5	Malignant neoplasm of splenic flexure
153.8	Other specified sites of large intestine	C18.8	Malignant neoplasm of overlapping sites of colon
153.9	Colon, unspecified	C18.9	Malignant neoplasm of colon, unspecified
155.0	Liver, primary	C22.0	Liver cell carcinoma
		C22.2	Hepatoblastoma
		C22.7	Other specified carcinomas of liver
		C22.8	Malignant neoplasm of liver, primary, unspecified as to type
155.1	Intrahepatic bile ducts	C22.1	Intrahepatic bile duct carcinoma
155.2	Liver, not specified as primary or secondary	C22.9	Malig neoplasm of liver, not specified as primary or secondary
197.7	Secondary malignant neoplasm of liver	C78.7	Secondary malig neoplasm of liver and intrahepatic bile duct
211.5	Benign neoplasm of liver and biliary passages	D13.4	Benign neoplasm of liver
230.8	Carcinoma in situ of liver and biliary system	D01.5	Carcinoma in situ of liver, gallbladder and bile ducts
235.3	Neoplasm of uncertain behavior of liver and biliary passages	D37.6	Neoplasm of uncertain behavior of liver, GB & bile duct
289.81	Antiphospholipid Antibody Syndrome	D68.51	Activated protein C resistance
		D68.52	Prothrombin gene mutation
		D68.59	Other primary thrombophilia
		D68.61	Antiphospholipid syndrome
		D68.62	Lupus anticoagulant syndrome
570	Acute and subacute necrosis of liver	K72.00	Acute and subacute hepatic failure without coma
571.0	Alcoholic fatty liver	K70.0	Alcoholic fatty liver
571.1	Acute alcoholic hepatitis	K70.10	Alcoholic hepatitis without ascites

If you have any questions, please contact patient@wsha.org.

ICD-9 Dx Code	ICD-9 Dx Code Description	ICD-10 Dx Code	ICD-10 Dx Code Description
571.2	Alcoholic cirrhosis of liver	K70.30	Alcoholic cirrhosis of liver without ascites
571.3	Alcoholic liver damage, unspecified	K70.9	Alcoholic liver disease, unspecified
571.40	Chronic hepatitis, unspecified	K73.9	Chronic hepatitis, unspecified
571.41	Chronic persistent hepatitis	K73.0	Chronic persistent hepatitis, not elsewhere classified
571.42	Autoimmune hepatitis	K75.4	Autoimmune hepatitis
571.49	Other	K73.2	Chronic active hepatitis, not elsewhere classified
571.5	Cirrhosis of liver without mention of alcohol	K74.0	Hepatic fibrosis
		K74.60	Unspecified cirrhosis of liver
		K74.69	Other cirrhosis of liver
571.6	Biliary cirrhosis	K74.3	Primary biliary cirrhosis
		K74.4	Secondary biliary cirrhosis
		K74.5	Biliary cirrhosis, unspecified
571.8	Other chronic nonalcoholic liver disease	K76.0	Fatty (change of) liver, not elsewhere classified
571.9	Unspecified chronic liver disease without mention of alcohol	K74.1	Hepatic sclerosis
		K76.9	Liver disease, unspecified
572.2	Hepatic encephalopathy	K72.90	Hepatic failure, unspecified without coma
		K72.91	Hepatic failure, unspecified with coma
572.3	Portal hypertension	K76.6	Portal hypertension
572.4	Hepatorenal syndrome	K76.7	Hepatorenal syndrome
572.8	Other sequelae of chronic liver disease	K72.10	Chronic hepatic failure without coma
		K72.90	Hepatic failure, unspecified without coma
573.0	Chronic passive congestion of liver	K76.1	Chronic passive congestion of liver
573.1	Hepatitis in viral diseases classified elsewhere	K77	Liver disorders in diseases classified elsewhere
573.2	Hepatitis in other infectious diseases classified elsewhere	K77	Liver disorders in diseases classified elsewhere
573.3	Hepatitis, unspecified, toxic (noninfectious) hepatitis	K71.6	Toxic liver disease with hepatitis, not elsewhere classified
573.4	Hepatic infarction	K76.3	Infarction of liver
573.5	Hepatopulmonary syndrome	K76.81	Hepatopulmonary syndrome
573.8	Other specified disorders of liver, hepatoptosis	K76.1	Chronic passive congestion of liver
		K76.89	Other specified diseases of liver
573.9	Unspecific disorder of liver	K76.9	Liver disease, unspecified
964.2	Poisoning by anticoagulant	T45.11A	Poisoning by anticoagulants, accidental, initial