ANALYSIS OF DOSE, COST AND USE PATTERNS OF ERYTHROPOIETIN STIMULATING AGENTS IN CANCER PATIENTS

Daniel GW1, Hurley D2, Whyte J1, Grochulski W3, Willey V1, Kallich J2

1HealthCore, Inc. and The University of Arizona, Tucson, AZ, USA, 2Amgen, Thousand Oaks, CA, USA, 3HealthCore, Inc, Wilmington, DE, USA

OBJECTIVES: Cancer patients who develop anemia are often treated with erythropoietin-stimulating agents (ESAs), including darbepoetin alfa (DA) or epoetin alfa (EA). This study compared baseline characteristics, patterns of ESA use, costs, and dosing among cancer patients as observed in a large managed care claims database. METHODS: Medical and pharmacy claims from a U.S. managed care database were used to identify 15,007 unique episodes of care (7238 with DA, 7769 with EA) in cancer patients between January 2004 and 2006. Episodes included all ESA claims with ≤42 day gap between claims, plus a duration of clinical benefit based on the median days between consecutive doses for each product. The dose conversion ratio was calculated as the mean weekly dose of EA to DA. Six sensitivity analyses examined the robustness of findings to study methods. Costs were determined from plan allowed amounts for ESA claims. RESULTS: The mean ($±$SD) number of administrations per episode was 3.7 (±4.1) for DA and 5.3 (±6.4) for EA. The mean ESA episode duration was 55.5 (±64.7) days for DA and 59.2 (±59.2) days for EA and median time between consecutive claims was 15 and 8, respectively. The estimated mean weekly dose of DA was 105 ($±$56) mcg for DA and 34,242 (±28,174) U for EA. The corresponding dose ratio is 1 : 326. In the sensitivity analyses, mean weekly doses were sensitive to the inclusion/exclusion of duration of clinical benefit (dose ratio 1 : 326 vs. 1 : 237, respectively). Patients receiving DA differed significantly in baseline characteristics compared to patients receiving EA. When DCB adjusted costs were compared, the mean weekly cost of Aranesp was lower than for Procrit. CONCLUSION: ESA use differed significantly between DA and EA. Adjustments for patterns of use are necessary to appropriately compare the drugs and their costs.

NEW SYSTEM OF COSTLY DRUG REIMBURSEMENT IN FRANCE: ASSESSMENT IN A TEACHING HOSPITAL ONCOLOGY DEPARTMENT

Baylatry MT, Joly AC, Prugnaud JL, Tilleul P
Saint Antoine Hospital, Paris cedex 12, France

OBJECTIVES: The payment of costly drugs is not included in the DRG price within the context of the French case-mix based hospital payment system (termed T2A) since 2005/01/01. These drugs will be reimbursed on an additional cost basis after implementation of a “best practices” agreement (good practice reference guidelines drawn up by scientific societies and registration agencies). The objective of this study was to assess the proportion of off-label costly anticancer drug use in terms of reference guidelines on oncology and the impact of their unreimbursement on the hospital activity. METHODS: A 18-month retrospective study (2005/01/01–2006/06/30) was performed in oncology department. 11 costly anticancer drugs were eligible for the additional reimbursement. 8416 adult patient prescriptions (943 patients) including at least one of the eleven studied drugs were analysed. For each prescription, the anticancer drug cost was calculated. The analysis of use was performed by drug: conformity to the official labelling (indication, dose, route of administration) and level of scientific evidence. The off-label anticancer drug use was discussed with prescribers in drug committee. RESULTS: The proportion of off-label costly anticancer drug use is 32% (2693/8416 prescriptions) and represents 29% (€2,020,373/€6,877,879) of oncology overall drug budget. Among these prescriptions, 43% (1153/2693 prescriptions) were supported by at least one randomized phase III trial and represent 59% (€1,191,068/€2,020,373) of the oncology costly anticancer drug induced cost. CONCLUSION: The reference guidelines should lead towards the good use of these drugs and allow the sick funds to control prescriptions. However, the official labelling of drugs is unable to answer to all clinical situations and cannot be the own references for costly anticancer drug reimbursement. The anticancer drug prescriptions from therapeutic progress (justified off label used) need to be reimbursed to maintain quality of cancer care in French hospitals.

OUTPATIENT USE OF HEMATOPOIETIC COLONY STIMULATING FACTORS (CSF) AMONG ELDERLY CANCER PATIENTS WITH CHEMOTHERAPY

Shih YCT, Xu Y, Elting LS
The University of Texas M.D. Anderson Cancer Center, Houston, TX, USA

OBJECTIVES: Recent studies have established aging as a risk factor of chemotherapy-induced neutropenia. Thus, the 2006 ASCO guideline added prophylactic use of CSF in older cancer patients to its recommendations. Our study examined current patterns of CSF use in outpatient settings in this population. METHODS: We selected cancer patients with chemotherapy from the 2001–2004 Medicare MarketScan data, a proprietary dataset collecting Medicare and commercial claims for a group of retirees with Medicare supplemental insurance. We defined the index date as the first date of chemotherapy, followed patients for 60 days, and classified high-risk patients as those whose chemotherapy regimens had a greater than 40% risk of neutropenia. We identified outpatient CSF use using HCPCS codes and conducted logistic regression to examine factors associated with CSF use; factors included age, gender, cancer types, risk class, geographic regions, and the index year. A subgroup analysis of the high-risk patients was also performed. RESULTS: We found CSF use in 8.71% (5455 in 62,647) of the patients and 19.8% (754 in 3812) among high-risk patients. Compared with patients in the age group 65–69, those in 75–79 and 80+ groups were significantly less likely to use CSF (OR = 0.83 CI: 0.76–0.90; OR = 0.73, CI: 0.66–0.79, respectively). High-risk patients were more likely to use CSF (OR = 1.12, CI: 1.02–1.24), so were those treated in more recent years. Compared with lung cancer patients, breast cancer and lymphoma patients were 1.23 (CI: 1.15–1.41) and 1.81 (CI: 1.64–2.00) times more likely to use CSF. Subgroup analysis showed that patients 75 and over were significantly less likely (OR = 0.83, CI: 0.70–0.99) to use CSF than those under 75. CONCLUSION: The observed lower rate in CSF use in the older age groups points to an unmet supportive care need in a subgroup of patients who are more susceptible to neutropenia due to aging.

FREQUENCY AND DISTRIBUTION OF CERVICAL SCREENING SMEARS IN HUNGARY

Bonzc I1, Sebestyén A1, Betlehem J2, Ölah A1, Ember I3
1National Health Insurance Fund Administration, Budapest, Hungary, 2University of Pécs, Pécs, Hungary

OBJECTIVES: Organized nationwide screening programme for cervical cancer was introduced in Hungary in 2003. Women between the ages 25–65 are invited by a personal letter and a 3 years screening interval has been applied. The screening rate