

El material que se presenta a continuación proviene de los datos proporcionados por la OAIC (Oficina de Apoyo a la Investigación Clínica de nuestro Hospital).

Abstracts de publicaciones nacionales ISI 2012

DEPARTAMENTO CARDIOVASCULAR

ENDOCARDITIS INFECCIOSA: CARACTERÍSTICAS CLÍNICAS, COMPLICACIONES Y MORTALIDAD EN 506 PACIENTES Y FACTORES PRONÓSTICOS DE SOBREVIVENCIA A 10 AÑOS (1998 – 2008). ESTUDIO COLABORATIVO NACIONAL EN ENDOCARDITIS INFECCIOSA EN CHILE (ECNEI).

REV MÉD CHILE 2012; 140(12): 1517-1528

Miguel Oyonarte, Rodrigo Montagna, Sandra Braun, Pamela Rojo, José L Jara, Mauricio Cereceda, Marcelo Morales, Carolina Nazal, Faustino Alonso

Background: Rates of morbidity and mortality in Infective Endocarditis (IE) remain high and prognosis in this disease is still difficult and uncertain. Aim: To study IE in Chile in its active phase during inpatient hospital stay and long term survival rates. Material and methods: Observational prospective national cohort study of 506 consecutive patients included between June 1, 1998 and July 31, 2008, from 37 Chilean hospitals (secondary and tertiary centers) nationwide. Results: The main findings were the presence of Rheumatic valve disease in 22.1% of patients, a history of intravenous drug abuse (IVDA) only in 0.7%, the presence of Staphylococcus aureus in 29.2% of blood cultures, negative blood cultures in 33.2%, heart failure in 51.7% and native valve involvement in 86% of patients. Echocardiographic diagnosis was achieved in 94% of patients. Hospital mortality was 26.1% and its prognostic factors were persisting infection (Odds ratio (OR) 6.43, Confidence Interval (CI) 1.45 – 28.33%), failure of medical treatment and no surgical intervention (OR 48.8; CI 6.67 – 349.9). Five and 10 years survival rates were 75.6 and 48.6%, respectively. The significant prognostic factors for long term mortality, determined by multivariate analysis were the presence of diabetes, Staphylococcus aureus infection, sepsis, heart failure, renal failure and lack of surgical treatment during the IE episode. Conclusions: The microbiologic diagnosis of IE must be urgently improved in Chile. Mortality rates are still high (26.1%) partly because of a high incidence of negative blood cultures and the need for more surgical valve interventions during in-hospital period. Long term prognostic factors for mortality should be identified early to improve outcome.

ANGIOPLASTÍA PRIMARIA EN INFARTO AGUDO AL MIOCARDIO EN ARTERIA CORONARIA DERECHA CON ORIGEN ANÓMALO. CASO CLÍNICO

REV MED CHILE 2012; 140: 88-92

Ugalde, Héctor; Muñoz, Macarena; Ugalde, Diego; García, Sebastián

Anomalous origin of coronary arteries is a rare anatomical defect and its association with acute myocardial infarction is unusual. We report a 58-year-old male with ST-Segment elevation. Myocardial infarction of the inferior wall caused by a total occlusion on the proximal third of an anomalous right coronary artery, that was effectively treated with primary angioplasty with stent placement. The patient had a favorable outcome and is asymptomatic after five years of follow up.

DEPARTAMENTO DE CIRUGÍA

ROL DE LA CIRUGÍA MÍNIMAMENTE INVASIVA EN LA PATOLOGÍA ESOFÁGICA BENIGNA: REPORTE DE UNA SERIE DE CASOS

REV MED CHILE 2012; 140: 703-712

Italo Braghetto M., Owen Korn B., Gonzalo Cardemil H., Héctor Valladares H., Gonzalo Masia L., Carlos Mandiola B.

Background: Minimally invasive surgery has the advantage of a lower rate of complications and can be used for benign esophageal diseases. Aim: To report a single surgeon experience with laparoscopic surgery for benign esophageal diseases. Material and Methods: Prospective analysis of 421 patients (160 males) with benign esophageal disease, who were subjected to laparoscopic surgery by a single surgeon. Immediate mortality, surgical complications and long term results in terms of symptoms recurrence, were analyzed. Results: The underlying diagnoses of the operated patients were Barrett's esophagus or esophagitis in 257, hiatal hernia in 91, achalasia in 68 and esophageal diverticula in five. Surgery obtained successful results in 90% of patients with Barrett's esophagus. Among patients with hiatal hernia, there was a 12% rate of complications and a 30% recurrence, when a mesh was not used. Among patients with achalasia the recurrence rate was less than 5%. Conclusions: Laparoscopic surgery has a fair success rate in benign esophageal diseases, with a lower rate of complications.

ACTINOMICOSIS TORÁCICA COMO DIAGNÓSTICO DIFERENCIAL DE NEOPLASIA: A PROPÓSITO DE UN CASO

REV CHIL INFECTOL 2012; 29: 455-458

Nicolás Pereira, Pedro Cuevas, Camila Valencia, Javier Vega, Iván Gallegos, Jaime Gonzalo Fernández, Jorge Salguero

Actinomycosis is an infrequent infection caused by bacteria from Actinomyces genus that manifests as a chronic, suppurative and progressive disease. It's more common in men. Thoracic actinomycosis occurs in 15% of the cases, and infection of the chest wall is less frequent. The clinical presentation mimics tuberculosis or neoplastic processes. In this article we present the case of a 63 year-old man with no comorbidity, with pulmonary actinomycosis involving the chest wall mimicking a neoplastic process, basing the diagnosis on histopathologic findings.

TRATAMIENTO QUIRÚRGICO DE LA ACALASIA ESOFÁGICA. EXPERIENCIA EN 328 PACIENTES

REV CHIL CIR 2012; 64: 46-51

Attila Csendes J., Italo Braghetto M., Patricio Burdiles P., Owen Korn B., Int. Juan E. Salas F.

Background: Patients with achalasia may require surgical treatment. Aim: To assess postoperative evolution, complications and mortality after surgical treatment of achalasia. Material and Methods: Analysis of 328 patients aged 13 to 80 years (51% females) with achalasia, operated in a period of 40 years. Open surgery was used in 165 patients and a laparoscopic modality (starting in 1994) in 163. Results: Patients subjected to open or laparoscopic surgery had similar demographic and manometric features. Mucosal injury during myotomy occurred in 20 (12%) and 10 (6%) of patients subjected to open or laparoscopic surgery, respectively ($p < 0.05$). Four patients operated using a laparoscopic approach had to be converted to open surgery. Two patients operated using an open approach had a postoperative leak. One patient had an abscess and one a hemoperitoneum. Conclusions: The surgical approach of choice for achalasia is laparoscopic, with a low incidence of complications.

FILTRACIONES EN BYPASS GÁSTRICO RESECTIVO POR LAPAROTOMÍA EN OBESIDAD MÓRBIDA

REV CHIL CIR 2012; 64: 52-62

Ana María Burgos L.

Background: Obesity is a severe disease whose prevalence continues to increase. Resective gastric bypass is one of the surgical procedures used in our center in patients with obesity, but like other techniques is not without complications, and the leak is one of the most serious. Aim: To determine by a prospective study the incidence, clinical presentation, postoperative course and treatment of obese patients with leaks after open resective gastric bypass. Material and Methods: From August 1999 to December 2009, 900 morbidly obese patients underwent open resective Roux-en-Y gastric bypass at the Hospital of the University of Chile. The use of drains and leak test with methylene blue during surgery, such as barium x-ray were performed in all patients as part of a protocol. Clinical signs, development, testing and treatment were recorded. Results: 36 patients (4%) developed leaks. Of the 900 patients died 3 (0.33%). Fever and tachycardia were the predominant symptoms. The diagnosis was made by imaging studies in 19 cases (52.7%). The leaks were mostly between 5 th and 9 th postoperative day. The most frequent location of the leak was at the gastrojejunal anastomosis (58.3%). Treatment was medical in 24 patients (66.7%), requiring re-operation only in 12 cases. The average time of closure of the leak was 35.5 days and the patients were hospitalized a total of 33.7 days on average. Conclusions:

In the series studied after resective gastric bypass the leak is presented in 4% of patients. Fever and tachycardia are useful signs to suspect a leak. The early detection of leaks is determinant to reach the best evolution of the patient and success in the treatment.

REGANANCIA DE PESO DESPUÉS DE LA CIRUGÍA BARIÁTRICA

REV CHIL CIR 2012; 64: 83-87

Karin Papapietro V.

Among obese subjects, bariatric surgery is very effective to achieve weight loss, to improve metabolic disturbances such as diabetes mellitus and to improve quality of life. However, long term follow up studies show that an important proportion of patients gain weight again. This phenomenon commonly occurs between the third and sixth postoperative year. The main risk factors for weight gain are behavioral and psychological issues, that can be detected in the preoperative assessment. This reinforces the concept that bariatric surgery must be managed by experienced multidisciplinary teams.

EFFECTOS DEL BYPASS GÁSTRICO EN EL ESÓFAGO DE BARRETT DE PACIENTES CON OBESIDAD MÓRBIDA

REV CHIL CIR 2012; 64: 155-160

Nicolás Pereira C., Attila Csendes J., Gladys Smok S., Ana María Burgos L., Solange Núñez B.

Background: Besides the weight reducing effects of gastric bypass, it is also a good antireflux procedure since there is no acid production by the gastric pouch and there is no duodenal reflux due to the presence of a Roux en Y. Aim: To describe the effect of gastric bypass on Barrett esophagus among patients with morbid obesity. Material and Methods: Among 896 patients subjected to gastric bypass, 14 patients with a Barrett esophagus diagnosed with endoscopy and biopsy, were followed. A new endoscopy was performed one to 30 months after the surgical procedure. Results: Short (≤ 30 mm) and long segment (> 31 mm) Barrett esophagi were present in eight and six patients, respectively. Gastroesophageal reflux symptoms relieved in 70% of these cases in a mean lapse of 6.5 months. There was regression from intestinal metaplasia to cardiac mucosa in six patients (75%) with short-segment, and in one patient (16%) with long-segment Barrett esophagus. Conclusions: Gastric bypass in patients with morbid obesity and Barrett esophagus is a very good antireflux operation. This was proved by the disappearance of symptoms in almost all patients and by the regression of the intestinal metaplasia which is time and length dependent.

HIPEROBESIDAD Y OBESIDAD MÓRBIDA: ESTUDIO COMPARATIVO

REV CHIL CIR 2012; 64: 233-237

Enrique Lanzarini S., Andrés Marambio G., Lara Fernández R., José Lasnibat R., Jaime Jans B., Emma Díaz G., Andrea Riffo M., Karin Papapietro V., Maher Musleh K., Juan Carlos Díaz J., Italo Braghetto M., Attila Csendes J.

Introduction: Bariatric surgery is effective and safe in treating obese patients with BMI > 40 , however, higher preoperative weight could increase morbidity and mortality. Aim: To describe and compare the perioperative and mid term outcomes between hiperobese and morbidly obese patients submitted to gastric bypass. Material and Method: A prospective study of hiperobese patients submitted to gastric bypass over the past 10 years. We analyzed clinical characteristics, perioperative morbimortality and resolution of comorbidities. The results were compared with a group of morbidly obese patients matched by age and sex. Results: 146 hiperobese were operated and compared with 165 morbidly obese patients. 66.8% were female and the average age of the total group was 39.9 ± 12.4 years, with no significant differences between groups by sex and age. The average BMI was 53 and 44.4 respectively. 21.5% had diabetes mellitus 2, 39.5% hypertension, 31% dyslipidemia and 8.4% osteoarthritis, with no significant differences between groups except for a higher prevalence of dyslipidemia in the morbidly obese ($p = 0.001$). 10.4% had surgical complications during the postoperative period, with no differences between both groups ($p = 0.24$). One year later all patients had a significant decrease in weight, however, hiperobeses showed a more pronounced decrease ($p = 0.001$). The fasting glucose, cholesterol and triglycerides levels also showed a significant decrease without reaching differences between the groups. Conclusions: The gastric bypass is effective in achieving weight loss and resolution of comorbidities in morbidly obese as well as hiperobese patients, with no significant differences in surgical complications and mortality.

MIELOLIPOMA SUPRARRENAL GIGANTE

REV CHIL CIR 2012; 64: 292-296

Patricio Gac E., Patricio Cabané T., Eulin Klein P., Int. Camila Seymour M., Dra. Paula Segura H.

Myelolipomas are rare benign tumors mostly located in the adrenal glands. They are usually asymptomatic with just a few millimeters in size, but they can grow over 30 cm becoming a life threat for the patient. This is a case of a 49 years old male patient who was diagnosed with a giant myelolipoma of the right adrenal gland while being studied for other reasons.

MANEJO QUIRÚRGICO DEL INCIDENTALOMA SUPRARRENAL

REV CHIL CIR 2012; 64: 25-31

Patricio Gac E., Patricio Cabané T., Jaime Jans B., Andrés Marambio G., Mauricio Díaz B., Verónica Araya Q., Víctor Avillo C.

Background: The adrenal incidentaloma is a lesion found on imaging studies for diagnosis of non-adrenal disorders. Most of these patients are not of surgical treatment. Our objective was to describe the clinical features and results of surgical management of adrenal incidentalomas in the Hospital de la Universidad de Chile. Material and Methods: Retrospective descriptive study. Period 2000 to 2009. Information was gathered from medical records and biopsies registers of patients with operated adrenal incidentaloma. Results: We evaluated 24 patients undergoing surgery, 66.7% female, 58.3% between 41 and 70 years. 58.3% were found in the study of abdominal pain. Surgical indications were: size ≥ 4 cm, enlarged in controls, atypical features in the abdominal and pelvic CT and/or functionality. 54.2% were ≥ 4 cm, 16.7% increase in size in controls, 45.8% had atypical features in the abdominal and pelvic CT and 33.3% were functioning, being the most frequent hypercortisolism. In 87.5% of patients the approach was laparoscopically. The morbidity was 12.6% (pneumonia, wound infection and stroke) and perioperative mortality was 0%. Discussion: The adrenal incidentaloma is a rare indication for surgery of adrenal tumors. Before the intervention should be studies in order to evaluate functionality and suspicion of malignancy. Functionating tumors and suspicious of malignancy should be resected, being the laparoscopic approach the election, likely in most cases.

BYPASS ANILLADO ¿CUÁL ES SU REAL UTILIDAD? ESTUDIO COMPARATIVO A DIEZ AÑOS

REV CHIL CIR 2012; 64: 361-367

William Awad F., Álvaro Garay M., Cristián Martínez M., Julio Yarmuch G.

Background: Placing a ring around the gastric reservoir could improve the weight lowering effects of gastric bypass. Previous studies have shown positive results of banded gastric bypass. Aim: To evaluate the long-term outcome of patients subjected to banded gastric bypass (GB) and non-banded GB procedures. Material and Methods: Ten years follow up of 260 non randomized obese patients who underwent banded GB and 218 patients in whom the ring was not placed. Excess weight loss (EWL), quality of life (QOL), food tolerance (FT), and correction of comorbidities were assessed. Results: The percentage EWL at ten years of follow up was 82 and 63% among patients subjected to banded and non-banded gastric bypass, respectively ($p < 0.01$). In three patients with banded GB, there was a migration of the ring to the interior of the stomach. Stenosis of the gastro-jejuno anastomosis occurred in 4 and 0.4% of patients subjected to banded and non-banded GB. Perception of quality of life was similar in both groups. The outcome in terms of comorbidities was not conclusive. Conclusions: There is a clear advantage in terms of EWL among patients subjected to banded GB. No differences in quality of life were found in both groups.

RESULTADOS ALEJADOS (10 AÑOS) DE LA FUNDOPLICATURA DE NISSEN EN PACIENTES CON REFLUJO GASTROESOFÁGICO PATOLÓGICO SIN ESÓFAGO DE BARRETT

REV CHIL CIR 2012; 64: 483-486

Attila Csendes J.

Background: Laparoscopic Nissen fundoplication is the most commonly used surgical technique for the treatment of gastroesophageal reflux. Method: This is a review of publications about long term results of the technique. Results: Thirteen papers reporting results at 10 years were identified. Heartburn recurrence was documented in 20 to 23% of patients. Symptoms such as bloating were reported by 47% of patients after the fundoplication. After 10 years, 25% of patients started to use proton pump inhibitors and a new surgical intervention was required by 9%. In eight reports, there was no objective assessment of surgical results. In one report only few cases had a radiological assessment. Only in three European reports and one report by us, endoscopy and esophageal manometry were performed. Conclusions: It is concluded that Nissen fundoplication achieves a relief of gastroesophageal reflux at 10 years in 75% of patients. There is a paucity of reports carrying out objective assessments of surgical results.

ROL DE LA CIRUGÍA MÍNIMAMENTE INVASIVA EN LA PATOLOGÍA ESOFÁGICA BENIGNA: REPORTE DE UNA SERIE DE CASOS

REV MED CHIL 2012; 140: 703-12

Braghetto M I, Korn B O, Cardemil H G, Valladares H H, Masia L G, Mandiola B C.

BACKGROUND: Minimally invasive surgery has the advantage of a lower rate of complications and can be used for benign esophageal diseases. AIM: To report a single surgeon experience with laparoscopic surgery for benign esophageal diseases. MATERIAL AND METHODS: Prospective analysis of 421 patients (160 males) with benign esophageal disease, who were subjected to laparoscopic surgery by a single surgeon. Immediate mortality, surgical complications and long term results in terms of symptoms recurrence, were analyzed. RESULTS: The underlying diagnoses of the operated patients were Barrett's esophagus or esophagitis in 257, hiatal

hernia in 91, achalasia in 68 and esophageal diverticula in five. Surgery obtained successful results in 90% of patients with Barrett's esophagus. Among patients with hiatal hernia, there was a 12% rate of complications and a 30% recurrence, when a mesh was not used. Among patients with achalasia the recurrence rate was less than 5%. CONCLUSIONS: Laparoscopic surgery has a fair success rate in benign esophageal diseases, with a lower rate of complications.

EVALUACIÓN DE PROGRAMA DE ESPECIALIDAD DE CIRUGÍA PLÁSTICA, REPARADORA Y ESTÉTICA DE LA UNIVERSIDAD DE CHILE. VISIÓN DE LOS ÚLTIMOS 6 AÑOS POR EGRESADOS

REV CHIL CIR 2012; 64: 523-527

Susana Benítez S., Patricio Andrades C., Stefan Danilla E., Cristian Erazo C., Sergio Sepúlveda P., Manuel Figueroa G.

Background: The evaluation that students perform of training programs is of utmost importance to introduce modifications. Aim: To evaluate a training program in plastic, reparative and esthetic surgery of the University of Chile. Material and Methods: A 32 question survey was devised. It was divided in five domains: general aspects, practical activities, theoretical activities, economic issues and post training situation. The survey was answered by 18 graduates pertaining to 2004 to 2010 promotions. Results: Seventy two percent of graduates considered the specialization program good or very good. Eighty three percent considered that the duration was insufficient and suggested that the program should last three years. The centers with the best evaluations were Hospital Militar and the clinical hospital of the University of Chile. The best evaluated rotations were burns, breast esthetic surgery and body contour surgery. Seventy seven percent considered that adequate surgical skills were acquired. Conclusions: The results of the survey indicate that the training program is good and is preparing skilled plastic surgeons.

CAUSAS DE MORTALIDAD POR COLECISTECTOMÍA TRADICIONAL Y LAPAROSCÓPICA 1991-2010

REV CHIL CIR 2012; 64: 555-559

Attila Csendes J., Julio Yarmuch G., Juan C. Díaz J., Jaime Castillo K., Fernando Maluenda G.

Background: Laparoscopic cholecystectomy is nowadays the standard surgical treatment for cholelithiasis. Aim: To determine surgical mortality of laparoscopic cholecystectomy as compared with the open procedure. Material and Methods: Review of medical records of all patients subjected to open or laparoscopic surgery in a surgical service of a clinical hospital, in a period of 20 years. Results: The records of 26.441 patients were reviewed. The figures for overall, open and laparoscopic surgery mortality were 0.16, 0.39 and 0.07% respectively. Only two of the 43 deceased patients, died as a direct complication of the surgical procedure. In the rest, the causes of mortality were underlying severe medical conditions. Conclusions: Laparoscopic cholecystectomy has a very low mortality that depends mostly on underlying medical conditions and advanced age.

DIVERTICULITIS AGUDA COMPLICADA: TENDENCIAS EN EL TRATAMIENTO ACTUAL

REV CHIL CIR 2012; 64(6): 581-585

Nicolás Pereira C., Javier Vega S., Alejandro Readi V., Mario Abedrapo M., Int. Alfonso Galleguillos G.

Diverticular disease refers to the presence of colon diverticula. Its prevalence increases with age and in a few cases present as diverticulitis. Acute complicated diverticulitis is potentially mortal, since it can perforate and require emergency surgery. The treatment of choice is the excision of the perforated segment and the creation of a proximal colostomy. There are other therapeutic alternatives such as excision with primary anastomosis and novel approaches such as laparoscopic peritoneal lavage. We herein review the new treatments of acute diverticulitis.

QUEMADURAS DE CUERO CABELLUDO. SERIE DE CASOS Y REVISIÓN DE LA LITERATURA

REV CHIL CIR 2012; 64: 161-168

Nicolás Pereira C., Patricio Léniz M., Estefanía Enríquez C., Günther Mabgelsdorff G., José Luis Piñeros B., Wilfredo Calderón O.

Background: The scalp is the most external and important barrier of the skull and brain. Its burns are often caused by high voltage injuries, fire, liquid or other heat sources. Aim: To report a series of cases of scalp burns seen during the last 10 years. Material and Methods: Retrospective review of medical records of patients that required hospital admission with a main diagnosis of scalp burn. Results: There were 2.266 consultations for head burns. Of these, 34 patients consulted with scalp burns and 11 were hospitalized. Four were due to electrical burns and four due to fire. As treatment in one case, a free flap was used but failed and required local advancement flaps. For the management of sequelae, expanders and then local advancement flaps were used. Conclusions: Only a small proportion of patients presenting with head burns, had scalp burns. Most were treated as outpatients and did not require further action. The four patients with electrical burns required more aggressive treatments. For the management the sequelae, expanders and local advancement flaps were used.

COMPLICACIONES DE IA PANCREATODUODENECTOMÍA, DIAGNÓSTICO Y MANEJO

REV CHIL CIR 2012; 64: 395-401

Xabier De Aretxabala U., Ricardo Rossi F., Juan Stambuck M., Jorge León C., Luis Manríquez C.

Pancreatoduodenectomy continues to have a high rate of complications. The most common and severe complications are intra or postoperative bleeding, pancreatic fistulae and derangements of gastric emptying. Each of these requires a great deal of clinical suspicion and an multidisciplinary management. This is a review of these complications, their clinical manifestations and their management.

RECONSTRUCCIÓN MAMARIA CON COLGAJO TRAM PEDICULADO

REV CHIL CIR 2012; 64: 40-45

Mauricio Ibáñez R., Gladys Ibáñez R. Nicolás Pereira C., Ints. Carlos Mandiola B., Romina Andino N.

The pedicle transverse rectus abdominus myocutaneous flap (TRAM) is widely used for breast reconstruction, however is not exempt from complications. Between 2004 and 2010 the authors performed breast reconstruction after total mastectomy in 52 patients with pedicled TRAM flaps. Purpose: To describe the demography, outcomes and complications in patients operated for breast cancer and reconstructed with TRAM flap. To assess the influence of smoking, the laterality and timing of reconstruction. Material and Method: Retrospective, observational and comparative. We reviewed the medical records of 52 patients operated by the authors between 2004 and 2010. Four cases were excluded due to incomplete data. Results: In the 48 patients studied were 50 TRAM flaps. The most frequent comorbidity was smoking (27%). Regarding the timing of reconstruction, 74% (37) was performed immediately post-mastectomy and 26% (13) was deferred. Was used by 78% (39) ipsilateral TRAM, 18% (9) contralateral and 4% (2) bilateral. Only minor complications were observed and the cosmetic result evaluated by the surgeon's satisfaction was very good or excellent in 62% (31). Smoking, timing of reconstruction and laterality did not affect in complications or cosmetic outcome ($p > 0.05$). Conclusions: The pedicled TRAM flap is an excellent alternative for reconstruction in breast cancer patients. It is not exempt from complications, with a tendency to get better cosmetic results in the non-smoker group.

DEPARTAMENTO DE MEDICINA

GASTROENTEROLOGÍA

LIGADURA ENDOSCÓPICA, UNA NUEVA OPCIÓN TERAPÉUTICA PARA LA ECTASIA VASCULAR ANTRAL: PRESENTACIÓN DE DOS CASOS CLÍNICOS

REV MED CHILE 2012; 140: 364-367

Jaime Poniachik T., Zoltán Berger F., Araxi Manuguán G.

Gastric antral vascular ectasia is an uncommon cause of chronic anemia, occasionally associated with cirrhosis. The most accepted therapy is argon plasma coagulation (APC), however there are refractory cases. We report two females with cirrhosis, aged 60 and 72 years, in whom management with APC was insufficient and in whom the need for hospital admissions and transfusions were reduced using the technique of endoscopic band ligation.

TRASPLANTE HEPÁTICO EN CIRROSIS POR VIRUS B: PROFILAXIS CON GAMMAGLOBULINA ANTIHBS EN DOSIS A "DEMANDA"

REV MED CHILE 2012; 140: 78-83

Jaime Poniachik, Carolina Pizarro, Jorge Contreras, Javier Silva, Carmen Hurtado, Mauricio Venegas, Jaime Castillo, Gonzalo Cardemil, Danny Oksenberg, José Ibarra, Angélica Bórquez, Juan Carlos Díaz

Infection recurrence rates among hepatitis B virus infected liver allograft recipients, may be as high as 80%. Immunoprophylaxis with anti HBVgammaglobulin may reduce these rates and improve survival. The dose of anti HBV gammaglobulin that must be used is not clearly defined. The most commonly accepted protocol uses 10,000 units during the anhepatic phase and 10,000 units daily during one week, followed by weekly doses of 10,000 units during one month and maintenance with 10,000 units monthly, without measuring anti hepatitis B surface antigen antibodies (antiHBs). Some reports recommend the use of immunoglobulin on demand, to maintain antiHBs titers between 100 and 250 U/l. The infection recurrence rates among patients treated with immunoglobulin and Lamivudine fluctuates between 0 and 10%, during follow up periods of 13 to 30 months. We report three liver allograft recipients that received immunoglobulin on demand, using a mean of 41,000 units, maintaining adequate antiHBs titers.

ENFERMEDAD DE MÉNÉTRIER CON COMPROMISO GÁSTRICO DIFUSO Y DUODENAL. CASO CLÍNICO

REV MED CHILE 2012; 140: 1174-1178

Macarena Gompertz, Cristián Montenegro, María Ester Bufadel, Carlos Defilippi, Jaime Castillo, Claudia Morales

Background: Ménétrier disease is a rare disorder of the stomach, characterized by giant hypertrophic folds that usually involve the gastric body and fundus, associated to hypoalbuminemia due to serum protein loss across the gastric mucosa. We report a 55-years-old male presenting with abdominal pain, vomiting, weight loss and hypoalbuminemia. Diffuse hypertrophic gastric folds, elevated ulcerated sessile lesions and focal duodenal involvement were seen at endoscopy. Biopsies showed foveolar hyperplasia and glandular atrophy with cystic dilatation. A total gastrectomy was performed with a good outcome.

ÍNDICE CLÍNICO DE GRAVEDAD EN PANCREATITIS AGUDA: BISAP ("BEDSIDE INDEX FOR SEVERITY IN ACUTE PANCREATITIS"). DOS AÑOS DE EXPERIENCIA EN EL HOSPITAL CLÍNICO UNIVERSIDAD DE CHILE

REV MED CHILE 2012; 140: 977-983

Macarena Gompertz, Lara Fernández, Ivone Lara, Juan Pablo Miranda, Carla Mancilla, Zoltán Berger

Background: Identification of patients at risk for severe disease early in the course of acute pancreatitis (AP) is essential to optimize management and to improve outcomes. Aim: To assess BISAP score as a predictor of severity of AP. Patients and Methods: Retrospective review of AP patients between January 2009 and December 2010. BISAP, APACHE II and Balthazar scores were calculated. Length of stay, local complications, organ failure and mortality were registered. Accuracy of the scoring system for predicting severity was measured by the area under the receiver operating curve (AUC). Results: The medical records of 128 patients, median age 46.5 years (55.5% men), were reviewed. Mean hospital stay was 15 days, 18 patients (14%) had local complications, 7 patients (5.4%) developed organ failure and 2 patients died (1.6%). The AUC for BISAP score to detect organ failure was 0.977 (95% IC 0.947-1.000). A BISAP score > 3 had a sensitivity, specificity, positive and negative predictive value of 71.4, 99.1, 83.3 and 98.3% respectively. An APACHE II score > 8 had a sensitivity and specificity of 71.5 and 86.8% respectively. The figures for a Balthazar score > 6 were 42.8 and 98.3% respectively. There was a significant correlation between BISAP score and length of hospital stay. Conclusions: BISAP score was a useful method for predicting the severity of PA, with the advantage of being simple and based on parameters obtained on the first day of hospitalization. Its sensitivity and specificity were superior to APACHE II and Balthazar score in this cohort.

MEDICINA NUCLEAR

UTILIDAD DEL ESTUDIO PET CON FDG EN LA EVALUACIÓN DE SARCOMAS DE DIVERSO ORIGEN Y DE TUMORES NO-SARCOMAS NO EPITELIALES (NSNE)

REV MED CHIL 2012; 140: 1116-25

Teresa Massardo, María Josefina Jofre, María Paulina Sierralta, José Canessa, Gabriel Castro, Isabel Berrocal, Iván Gallegos

Background: The usefulness of positron emission tomography (PET) with fluorine-deoxyglucose (FDG) in sarcomas and non-sarcoma non-epithelial (NSNE) tumors is not clearly defined Aim: To report a Chilean experience with NSNE tumors evaluated using PET with FDG. Material and methods: Retrospective review of the database of a PET laboratory. Demographic data, indications and metabolic findings were compared with conventional imaging in 88 adults and children with diverse bone and soft tissue sarcomas as well as 24 gastrointestinal stromal tumors (GIST), 6 pleural malignant mesotheliomas in adults, and 9 medulloblastomas in children. Results: FDG showed good concordance with conventional imaging in NSNE tumors. It was helpful for staging, restaging, follow-up after treatment and for the detection of new not previously suspected lesions. Conclusions: PET with FDG could have a prognostic role and help in patient management, mainly in musculoskeletal and high grade or less differentiated sarcomas. In GIST, it was a good tool for immunotherapy control.

DAÑO VASCULAR ASOCIADO A USO DE COCAÍNA. CASO CLÍNICO

REV MED CHILE 2012; 140: 507-511

Teresa Massardo, Ángela Pino, Isabel Berrocal, Gabriel Castro, Hernán Prat, Jaime Pereira

Background: Cocaine abuse is associated with an increased risk of cardiac and cerebrovascular events, such as myocardial infarction, sudden cardiac death, and ischemic stroke. The underlying mechanisms leading to these complications are not fully understood although intravascular thrombus formation and accelerated atherosclerosis are prominent findings. We report a 39-year-old male addicted to cocaine, who presented with three consecutive ischemic events characterized by an acute myocardial infarction and two ischemic strokes complicated by cardiac failure and severe neurological sequelae. The pathophysiology of cocaine-induced vascular damage and the management of the ischemic complications are discussed.

MEDICINA INTERNA

HIPOXEMIA ESPURIA POR HIPERLEUCOCITOSIS. REPORTE DE UN CASO Y REVISIÓN DE LA LITERATURA

REV MED CHILE 2012; 140: 503-506

Pablo Florenzano V., Luz María Letelier S., Josefina Durán SC., Cristóbal Sanhueza C., Luis Toro C.

Background: Arterial gasometry is considered the gold standard for establishing a diagnosis of respiratory failure of any etiology. However, there are some circumstances in which it loses specificity, making necessary to consider other tests such as pulse oximetry to adequately determine hypoxemia. We report a 67 years old patient with sudden hypoacusia, right hemiparesis and polypnea. His laboratory exams on admission, showed extreme hypoxemia in several readings, without correlation to the patient's clinical condition nor the pulse oximetry, and a leukocytosis of 800.000 cells x ml, with many immature cells. Chronic myeloid leukemia was diagnosed and treatment with hydroxyurea was initiated, achieving normalization in the arterial gases in accordance with the fall of the white cell count. Interpretation of laboratory findings according to the general clinical context of the patient allowed to suspect a spurious hypoxemia, saving the patient from unnecessary and risky interventions.

DEPARTAMENTO DE OBSTETRICIA Y GINECOLOGÍA

EVALUACIÓN DE LA GLOBULINA TRANSPORTADORA DE HORMONAS ESTEROIDALES (SHBG) DURANTE EL EMBARAZO COMO FACTOR PREDICTOR DE PRE-ECLAMPSIA Y RESTRICCIÓN DEL CRECIMIENTO INTRAUTERINO

REV MED CHILE 2012; 140: 589-594

Enrique Valdés R., Karina Lattes A., Hernán Muñoz S., Miguel Ángel Cumsille

Background: Sex-Hormone Binding Globulin (SHBG) may be associated to Pre-eclampsia (PE) and Fetal Growth Restriction (RCIU). Aim: To determine if maternal serum SHBG concentrations during the first and second trimesters are predictive biomarkers of Pre-eclampsia and RCIU. Patients and Methods: Prospective cohort study carried out in the Fetal Medicine Unit, Universidad de Chile Clinical Hospital between January, 2005 and December, 2006. Blood samples were obtained from unselected pregnant women during routine 11-14 week and 22-25 week ultrasound examinations, conforming two different study groups. Posteriorly, serum SHBG concentrations were determined in women who developed Pre-eclampsia, RCIU and their respective controls. Results: Fifty five patients were included in the 11-14 weeks group. Nine women that developed PE, 10 that developed RCIU and 36 controls were selected from this group. There were no significant differences in SHBG levels between patients with PE, RCIU or controls (324.7 (26.6), 336.8 (33.9) and 377.5 (24.3) nmol/L, respectively). Fifty four women were included in the 22-25 weeks group. Eight women who developed Pre-eclampsia, 15 who developed RCIU and 31 controls were selected. Again, there were no significant differences in SHBG levels between patients with PE, RCIU or controls (345.5 (151.1), 383.8 (143.4) and 345.5 nmol/l (151.1), respectively). Conclusions: Maternal SHBG serum levels did not predict subsequent development of Pre-eclampsia and RCIU.

DEPARTAMENTO DE NEUROLOGÍA Y NEUROCIROLOGÍA

ANGIOGENIC POTENTIAL OF THE CEREBROSPINAL FLUID (CSF) OF PATIENTS WITH HIGH-GRADE GLIOMAS MEASURED WITH THE CHICK EMBRYO CHORIOALLANTOIC MEMBRANE ASSAY (CAM).

BIOL RES 2012;45(2):135-8.

Sinning M, Letelier R, Rosas C, Fuenzalida M, Lemus D.

High-grade gliomas are highly vascularized tumors. Neo-angiogenesis plays a key role in tumor growth and resistance to therapy. A cerebrospinal fluid (CSF) sample could be a useful way to obtain pro-angiogenic predictive or prognostic markers at different stages of the disease. As a first step we looked for pro-angiogenic activity in the CSF of patients with high-grade gliomas. We performed the chicken embryo chorio-allantoic membrane (CAM) assay to study the angiogenic potential of the cerebrospinal fluid (CSF), obtained either by lumbar puncture (LP) or craniotomy from six patients with high-grade brain tumors (three glioblastoma (WHO grade IV), one anaplastic oligodendroglioma (WHO grade III), two anaplastic ganglioglioma (WHO grade III)), and four healthy controls. Significantly increased neo-angiogenesis was observed on the surface of the growing CAM in the 6 patients with high-grade gliomas compared to controls (3.69 ± 1.23 versus 2.16 ± 0.97 capillaries per area (mean \pm SD), $p < 0.005$). There was no statistical difference related to the histological grade of the tumor (WHO grade III or IV), previous treatment (radio-chemotherapy plus temozolomide, temozolomide alone or no treatment), or the site of CSF sample (surgery or lumbar puncture). Our results suggest a pro-angiogenic potential in the CSF of patients with high-grade gliomas.

ACTIVIDAD ESPONTÁNEA DE NOCICEPTORES CUTÁNEOS EN PACIENTES CON NEUROPATÍA DE FIBRAS DELGADAS

REV MÉD CHILE 2012; 11: 1383-1390

Mario Campero, Sebastián Campero

Painful polyneuropathy may result from selective impairment of small diameter nerve fibers, while tactile and motor functions are preserved. In these patients clinical and electrophysiological assessment is usually unrevealing. We report three patients with a pure painful polyneuropathy. One of them had neurogenic pruritus additionally. Quantitative sensory analysis disclosed a slight warm hypoalgesia (3/3) and paradoxical hot sensation (2/3) in the feet. Intra-neural recordings from the peroneal nerve demonstrated abnormal spontaneous activity in 8 of 17 nociceptive afferents. One of them displayed double firing reflecting impulse multiplication. These results support the notion that patients with pain or pruritus with a distal distribution could have small diameter afferent fiber damage, despite normal function of large diameter fibers.

PARÁLISIS GENERAL SIFILÍTICA: PRESENTACIÓN DE 5 CASOS

REV MED CHILE 2012; 140: 625-628

Archibaldo Donoso S., Ricardo Urzúa, Andrea Slachevsky CH., Carlos Silva R.

We report five male patients, aged 35 to 63 years who suffered from parietic neurosyphilis. The clinical course was that of a subacute dementia with a frontal syndrome, with more apathy than euphoria. All were HIV negative and four were heterosexual. In all, the cerebrospinal fluid had a mononuclear pleocytosis and a positive VDRL. EEG was abnormal in the 3 cases in whom it was performed. One patient in whom a brain angiography was performed, had images of vasculitis. Treatment with 18-24 million units of penicillin per day during two weeks or more, was partially effective.

VALORES NORMALES DE OLFATO, HIPOSMIA Y ANOSMIA EN POBLACIÓN CHILENA SANA SEGÚN LA BATERÍA "SNIFFIN STICKS"

REV MED CHILE 2012; 140: 442-6

Hudson L, Silva MC, Núñez JC, Gómez R, Venegas-Francke P.

BACKGROUND: Olfaction dysfunction is linked to neurodegenerative diseases, therefore the evaluation of this function is becoming important. AIM: To evaluate olfaction in healthy participants. MATERIAL AND METHODS: We evaluated 44 healthy males and 55 females, aged 21 to 89 years with the Sniffing Sticks battery to determine normal values in Chilean population. During the test, participants must correctly identify 12 different odors. RESULTS: Normal olfaction, hyposmia and anosmia were defined. An age related decline in olfaction was observed, especially among males aged 59 years or more. Conclusions: This study provides age and gender specific normal values for the Sniffing Sticks battery.

EVALUACIÓN DE LA ENFERMEDAD DE ALZHEIMER EN ETAPA TEMPRANA: BIOMARCADORES Y PRUEBAS NEUROPSICOLÓGICAS

REV MED CHILE 2012; 140: 1191-1200

Renzo Lanfranco G, Paula Manriquez-Navarro, Leyla Avello G, Andrés Canales-Johnson

Alzheimer disease is a neurodegenerative condition that affects global, behavioral and global functioning of patients. Currently and due to the lack of conclusive biological testing, Alzheimer disease diagnosis is based primarily on clinical criteria. Since its early diagnosis allows clinical interventions when neurological damage is relatively mild, the development of early detection tools has become a major topic of interest. In this article, we review the main neurobiological and neuropsychological features of Alzheimer disease, analyzing the use of biomarkers and neuropsychological testing for early detection.

DEPARTAMENTO DE PSIQUIATRÍA Y SALUD MENTAL

CONSUMO DE SUSTANCIAS Y SÍNTOMAS DEPRESIVOS EN ESCOLARES DE LICEOS MUNICIPALES DE SANTIAGO

REV MED CHILE 2012; 140: 184-191

Graciela Rojas, Jorge Gaete, Viviana Guajardo, Vania Martínez, Sergio Barroihlet, Juan Meneses, Rosemarie Fritsch, Ricardo Araya

Background: The presence of emotional problems may trigger drug abuse. Aim: To determine the association between illicit drug use and severity of depression symptoms among students of public secondary schools in Santiago, Chile. Material and Methods: A probabilistic sample of 2,597 adolescents aged between 12 and 18 years (45% women), attending first year in public high-schools in

Santiago, answered self-report questionnaires about consumption, during the last 30 days, of alcohol, tobacco and marihuana, and the Beck Depression Inventory - II. Logistic regression models were used to study the association between drug use and severity of depression symptoms, adjusting by sex. Results: Tobacco and marihuana use was reported by 38 and 13% of students, respectively. Frequency of consumption was significantly higher among women. Mild, moderate or severe depressive symptoms were found among 16%, 14% and 9% of students, respectively. Depressive symptoms were more common among women. There was a significant association between drug use and severity of depression among participants of both genders. Conclusions: The association between depressive symptoms and drug use should be considered on the design of treatment guidelines for these health problems in Chile.

IDEAS AUTOLÍTICAS, VIOLENCIA AUTOINFLIGIDA, Y SÍNTOMAS DEPRESIVOS EN ESCOLARES CHILENOS

REV MED CHILE 2012; 140: 873-881

Sergio Barroilhet, Rosemarie Fritsch, Viviana Guajardo, Vania Martínez, Paul Vöhringer, Ricardo Araya, Graciela Rojas

Background: Suicidal behaviors and depression are prevalent phenomena among adolescents, and are considered a public health problem. Aim: To determine the prevalence of depressive symptoms and suicidal behaviors and the relationship between both phenomena, in a representative sample of students from ninth grade in Santiago, Chile. Material and Methods: We recruited a probability sample of 2,597 adolescents who answered a questionnaire with questions about suicidal behavior and the Beck Depression Inventory (BDI-II). Results: The lifetime prevalence of suicidal ideation and planning was 21 and 14%, respectively. The prevalence for the past two weeks was 6.7 and 4.4% for suicidal ideation and planning, respectively. Autolytic behaviors, once in lifetime and in the past week were referred by 26 and 4% of respondents, respectively. In one third of these, self-harm coincided with recent suicide ideation or planning. All levels of suicidal behavior were more frequently reported by women. Clinically significant depressive symptoms were present in 23.5% of adolescents. Females doubled male rates. Severe depressive symptoms were present in 9.4% of the sample. A higher level of suicidal behavior correlated with more severe forms of depression. Sixty percent of adolescents who reported recent self-harm, had clinically relevant depressive symptoms. Two thirds of them had severe symptoms. Conclusions: Suicidal behavior in Chilean adolescents is prevalent, and there is an association between this behavior and the level of depression. The school is a good place to identify and develop preventive measures for teenagers.

OFICINA DE APOYO A LA INVESTIGACIÓN CLÍNICA

TELEPSIQUIATRÍA: UNA REVISIÓN SISTEMÁTICA CUALITATIVA

REV MED CHILE 2012; 140: 789-796

Ariel Castro, Alberto Larrain, Rosemarie Fritsch, Graciela Rojas

Background: The objective of this review was to search the literature on the use of telemedicine in mental health and evaluate if it can play a role in Chile. A systematic, qualitative review was carried out to compile systematic reviews, meta-analysis, and clinical controlled trials (CCT) that were in English or Spanish and that applied information technologies for the treatment of psychiatric diseases. Excluded from the review were articles without summaries or articles that included only the trial design, without results. The references of each selected article were critically evaluated. Of the 265 articles found, 224 were excluded for failing to comply with the inclusion criteria. Therefore, 41 articles were left for analysis, 30 reporting CCT and 11 systematic reviews. It is concluded that the use of information technologies to provide mental health care is widespread. It can be implemented in geographically remote places, without access to specialized mental health care and be a part of complex interventions that integrate several components.

SERVICIO ANATOMÍA PATOLÓGICA

TUMOR FIBROSO SOLITARIO DEL TIROIDES

REV CHIL CIR 2012; 64: 285-288

Iván Gallegos M., Int. Camila Concha F., Dr. Carlos Ferrada V.

Solitary fibrous tumor (SFT) is a rare spindle cell neoplasm mostly found in the pleural tissue but also described in other parenchymas. There are twenty four cases of thyroid SFT, all of them with similar histological appearance and immunohistochemical reaction pattern. We report the case of a thyroid tumor in a thirty year old man. The tumor was characterized by a proliferation of spindle cells arranged in a storiform and hemangiopericytoid pattern, without cell atypia and necrosis, and with low mitotic rate. The tumor

showed a strong positive immunohistochemical reaction for CD-34 and bcl-2. There were no reactions for Desmin, Pancytokeratin and S-100. All of these features confirm the diagnosis of a thyroid SFT. It is important to know that this entity can arise in the thyroid gland to direct the analysis in a correct way.

MOLECULAR SIGNATURE OF CANCER STEM CELLS ISOLATED FROM PROSTATE CARCINOMA AND EXPRESSION OF STEM MARKERS IN DIFFERENT GLEASON GRADES AND METASTASIS.

BIOL RES 2012;45(3):297-305.

Castellón EA, Valenzuela R, Lillo J, Castillo V, Contreras HR, Gallegos I, Mercado A, Huidobro C.

Prostate cancer (PCa) is the most frequently diagnosed malignancy in men worldwide. Chemotherapy response is very poor and resistance to hormone-based treatments is frequent in advanced stages. Recently, tumor-initiating cells or cancer stem cells (CSCs) have been identified in several cancers, including PCa. These cells are thought to be responsible for therapy resistance, relapse and metastasis. In the present work, enriched populations of CSCs were obtained using a mixed procedure that included differential clone-forming ability, sphere growing induction (prostatospheres) and magnetic-associated cell sorting (MACS). Also, stem marker expression was determined in PCa biopsies of different histological grades and metastasis samples. The signature for stem markers of the isolated CSCs was CD133+/CD44+/ABCG2+/ CD24-. Expression of stem markers (CD133, CD44, and ABCG2) was higher in medium Gleason biopsies than in lower and higher grades, and lymph-node and bone metastasis samples. These results suggest that the CSCs in PCa reach an important number in medium Gleason grades, when the tumor is still confined into the gland. At this stage, the surgical treatment is usually with curative intention. However, an important percentage of patients relapse after treatment. Number and signature of CSCs may be a prognosis factor for PCa recurrence.

SERVICIO LABORATORIO CLÍNICO

PRIMER CASO DE DETECCIÓN DE BLAKPC EN CHILE: DESDE ITALIA A UN HOSPITAL PÚBLICO DE SANTIAGO

REV CHIL INFECT 2012; 29 (2): 224-228

Marcela Cifuentes, Patricia García, Paola San Martín, Francisco Silva, Jennifer Zúñiga, Sergio Reyes, Rodrigo Rojas, Rodrigo Ponce, Raúl Quintanilla, Luis Delpiano y Marcelo Wolff

Carbapenem resistance in Enterobacteriaceae is an emerging problem worldwide. Among the mechanisms involved are the production of ESBLs or AmpC associated with porins loss or the presence of carbapenemases. Among these, the KPC beta-lactamase has become especially relevant given its rapid spread. In this article we present the first case of isolation of a strain of KPC producer *Klebsiella pneumoniae* at a hospital in Santiago, in a patient coming from Italy, with a history of multiple hospitalizations for treatment of non-Hodgkin lymphoma and subjected to several cycles of chemotherapy and hemodialysis. The strain was isolated from a urine culture on the seventh day of the patient's arrival to Chile. The isolate was resistant to quinolones, aminoglycosides, cephalosporins and carbapenems, retaining only susceptibility to tigecycline and colistin. In phenotypic test it was found to have positive Hodge test and positive synergy with carbapenems/boronic acid. Polymerase chain reaction demonstrated the presence of beta-lactamases TEM, SHV and KPC-2.

SERVICIO DE PEDIATRÍA

BROTOS DE SALMONELOSIS Y EL TAMAÑO Y ROL DEL ESTADO EN CHILE

REV CHIL INFECT 2012; 29 (2): 207-214

Alberto Fica, Gerardo Acosta, Jeannette Dabanch, Cecilia Perret, Marisa Torres, Javier López, Leonor Jofré y Thomas Weitzel

During year 2011 two outbreaks of Salmonella infection captured media attention in the Metropolitan Area (MA) in Chile: one of typhoid fever associated to Salmonella serotype Typhi, and the other, of gastroenteritis related to Salmonella serotype Enteritidis, both with decreasing or stable rates in the previous years. The aim of this work is to analyze probable causes of their reemergence. Methods: Several government websites were searched looking for epidemiological data. Results: Typhoid fever rates have declined to current values of 1 case per 100.000 habitants, a decrease associated to improvements in the human development index. The typhoid outbreak was associated to a predominant clone within the MA. The only risk factor identified was consumption of raw vegetables acquired in open fairs, but without identifying a common source. Despite improvements in disease notification

and molecular epidemiology capabilities, this outbreak is coincidental with a reduced number of food inspection visits in the MA, probably explained by the limited personnel available for this task. In the case of Salmonella Enteritidis, rates have increased twice since 1998 (5.3 to 10.7 per 100.000 habitants) with an important increase in the number of outbreaks linked to this agent (7 to 31 annual outbreaks) since year 2005. Persistence of this problem is probably associated to the low surveillance of poultry farms made by the Chilean state, to the absence of a cold chain during collection, distribution and selling of eggs, and to the lack of an educational program directed to the population. The recent regulation that bans home-made mayonnaise in restaurant or fast food stores is an important advance that requires further evaluation. Conclusions: The persistence and reemergence of different kind of Salmonellosis in Chile suggests chronic problems on the size and role of the Chilean state regarding food safety.

UNIDAD PACIENTES CRÍTICOS

DELIRIUM POSTOPERATORIO. UNA VENTANA HACIA UNA MEJORÍA DE LA CALIDAD Y SEGURIDAD EN LA ATENCIÓN DE PACIENTES QUIRÚRGICOS

REV CHIL CIR 2012; 64: 297-305

Eduardo Tobar A., Mario Abedrapo M., Jaime Godoy C., Carlos Romero P.

Postoperative delirium or acute confusional state is a common complication among older subjects. Many factors influence its appearance, such as preexistent problems of the patient, medication use, pain, the perioperative anesthetic management and the intensity of the inflammatory reaction to surgical trauma. Its consequences are a longer hospital stay, higher risk of complications and a long term derangement of functional status and cognitive performance. The management of delirium is multifactorial, including the avoidance of precipitating factors, the maintenance of an adequate environment and the conscious use of neuroleptics. The prevention of delirium should be a priority that will improve health care standards.

BANCO DE SANGRE

FRECUENCIA GÉNICA DE ANTÍGENOS MENORES DE HISTOCOMPATIBILIDAD EN LA POBLACIÓN CHILENA Y ESTIMACIÓN DE SUS EFECTOS INMUNOLÓGICOS EN EL TRASPLANTE ALOGÉNICO DE PROGENITORES HEMATOPOYÉTICOS

REV MED CHILE 2012; 140: 555-560

Claudio Pérez N., Ramón Rabanales T., Milton Larrondo L., Jorge Alfaro L.

Background: Minor histocompatibility antigens (mHAg) play a critical role in the immune responses associated with allogeneic stem cell transplantation, such as graft versus host disease (GVHD) and graft-versus-tumor (GVT). Aim: To determine the gene frequencies of the mHAg HA-1, HA-2 and HA-8 in Chilean Blood Bank donors. Material and Methods: Blood from 192 blood donors was analyzed. The presence of haplotype HLA-A*02 was determined by flow cytometry. The frequency of mHAg was determined by allele specific polymerase chain reaction in genomic DNA. Results: Sixty one participants were carriers of the haplotype HLA-A*02. The relative allele frequency HA-1H was 45%, HA-1r 55%, HA-2V 80.6%, HA-2M 19.4%, HA-8R 49.8% and HA-8P was 50.2%. Based on mHAg disparity between HA-1, HA-2 or HA-8, the probability to generate a GVT response in HLA-A*02 individuals was 40%. Conclusions: The mHAg frequency in Chilean population is under Hardy-Weinberg equilibrium and they are similar to those of other ethnic populations in the world.

CENTRO DE IMAGENOLÓGÍA

PROTEÍNA C REACTIVA EN LA EPOC Y SU RELACIÓN CON LA GRAVEDAD DE LA ENFERMEDAD, LAS EXACERBACIONES Y LAS COMORBILIDADES

REV MED CHILE 2012; 140: 569-578

Orlando Díaz, Alejandra Parada, Critóbal Ramos, Julieta Klaassen, Juan Carlos Díaz, Max Andresen, Carmen Lisboa, Fernando Saldías

Background: Patients with chronic obstructive pulmonary disease (COPD) have elevated serum levels of ultrasensitive C reactive protein (CRP_{us}). This raise may be related directly to COPD and its associated systemic inflammation or secondary to other factors such as smoking status, disease severity, acute exacerbations, or associated complications. Aim: To evaluate the potential causes

of raised levels of CRPus in stable COPD patients. Patients and Methods: Cohorts of 133 mild-to-very severe COPD patients (41 current smokers), 31 never-smokers, and 33 current smoker controls were compared. Clinical assessments included body mass index (BMI), fat (FM) and fat-free mass (FFM) measurement by DEXA, forced expiratory volume in one second (FEV1), arterial oxygen tension (PaO2), six-minute walking test (SMWT), emphysema (EMPH) and right thigh muscle cross-sectional area (TMCSA), both quantified by high resolution computed tomography. Results: Serum CRPus levels were significantly higher in COPD patients than in controls (7 ± 4.2 and 3.7 ± 2.7 mg/L respectively; $p < 0.0001$). Being smoker did not influence CRPus levels. These levels were significantly correlated with FM ($r = 0.30$), BMI ($r = 0.21$), FEV1 ($r = -0.21$), number of acute exacerbations of the disease in the last year ($r = 0.28$), and PaO2 ($r = -0.27$). Using multivariate analysis FM, PaO2, and number of acute exacerbations of the disease in the last year had the strongest association with CRPus levels. Conclusions: CRPus is elevated in COPD patients, independent of smoking status. It is weakly associated with fat mass, arterial oxygen tension and frequency of exacerbations.