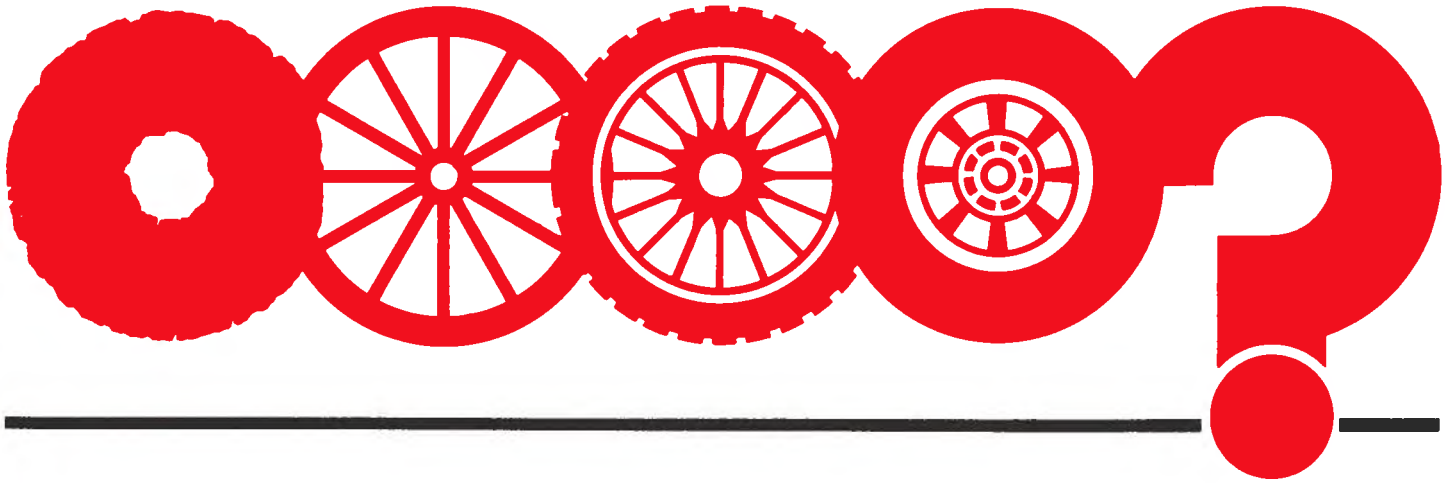
new products bulletin

bulletin de produits nouveaux

Bulletin 314, March 1982

Bulletin 314, Mars 1982



new products bulletin

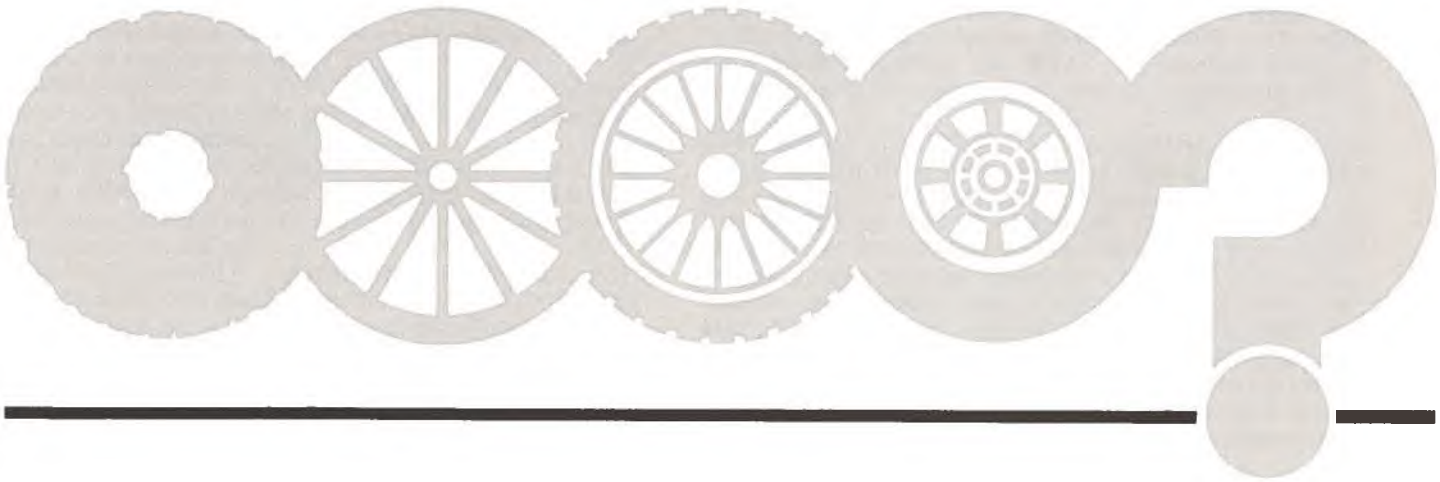
bulletin de produits nouveaux

This monthly bulletin is published to inform Canadian industry of licensing and joint venture opportunities that may be investigated for the purpose of forming manufacturing affiliations. The Department cannot assume any responsibility for claims made or for transactions which ensue from the publication of any items in this bulletin. If you are interested in any of the proposals you should contact the correspondent identified with the item and send a copy of your initial correspondence to the Canadian Government Trade Commissioner responsible for the area at the address indicated, in order that he can provide appropriate assistance or commercial information.

The Licensing Opportunities Section (34/3) of the BUSINESS CENTRE of the Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5 (Telephone: (613) 995-5771) should be advised of any agreements concluded as a result of this publicity.

Publié tous les mois, le présent bulletin a pour objet d'informer l'industrie canadienne des occasions de fabrication sous licence et d'entreprises en participation qu'il est possible d'étudier aux fins de constituer des affiliations manufacturières. Le Ministère ne peut assumer aucune responsabilité à l'égard des réclamations ou transactions découlant de la publication d'articles dans le présent bulletin. Si l'une ou l'autre des propositions vous intéresse, auriez-vous l'obligeance de communiquer avec le correspondant et transmettre copie de votre premier échange de correspondance au délégué commercial du Gouvernement du Canada qui s'occupe de la région en cause, à l'adresse indiquée, afin qu'il puisse vous fournir l'aide ou les renseignements commerciaux pertinents.

Prière d'informer la Section des possibilités de licences (34/3), du CENTRE DES ENTREPRISES, ministère de l'Industrie et du Commerce, Ottawa (Ontario) K1A 0H5 (tél. (613) 995-5771), de toute entente intervenue à la suite de la présente publicité.



Selected Licensing or Joint Venture Manufacturing Opportunities

Instrumentation/314

East German manufacturer offers licensing rights to a Canadian company for the following instruments:
SI-MULTICHIP-HYBRID-PHOTODETECTOR-ARRAYS (Reference Number 33-2.4/002) used for the unified procedure of mounting and measuring silicon epitaxial planar photodetector chips on PC boards;
REMAT T PROCESS REFRATOMETER (Reference number 33-1.4/001) used for the continuous analysis of liquids in the chemical industry, especially the synthetic fibre, petroleum, beverage and sugar industries;
REMAT 30 PROCESS CONTROL REFRACTOMETER (Reference Number 33-1.4/002) an upgraded descendant of the REMAT-20, which has been manufactured and sold worldwide for a number of years. The new model features improved performance due to new functional principles, so that it can now cope with a broader spectrum of user problems;
WEDGE-DISC LEVELLING BASE (Reference Number 33-1.9/010) used for varying the inclination of an instrument relative to its base by means of two wedge-shaped circular discs arranged on a common shaft passing through their centres and connecting the instrument to its base;
MEASUREMENT OF DEVIATION OF THE CENTRE OF CURVATURE (Reference Number 33-4.1/002) which is a reflex image technique and instrument for the measurement of the deviation of the centre of curvature of optical elements;
THE UEM UNIVERSAL FLATNESS TESTER (Reference Number 33-4.2/002) used for measuring deviations from a true plane on components having precision-machined surfaces;
HONEYCOMB CONDENSER (Reference Number 33-1.9/011) which is an optical facility providing improved, even illumination of an object field;
FRESNEL LENS CUTTING LATHE (Reference Number 33-3.2/005) for cutting plastic Fresnel lenses of diameters up to 400 mm, with groove spacings selectable anywhere between 0.05 and 0.5 mm;
PHOTOGRAPHIC FRESNEL LENS CUTTING LATHE (Reference Number 33-3.2/006) for making original Fresnel lenses of PMMA with outer diameters up to 90 mm intended for use in the viewfinders of photocameras;
VACUUM PUMP-SYSTEM FOR LASER TUBES (Reference Number 33-2.2/010) used in the production lines for low-power HeNe laser tubes;
MOTION TRANSMISSION INTO A HIGH-VACUUM CONTAINER (Reference Number 33-1.9/013) used for the mechanical transmission of a motion from the outside into a high-vacuum container;
AUTOMATIC HANDLE MOUNTING MACHINE FOR GLASSES HAA 1200 (Reference Number 08-3.1/005) used for mounting of glass handles to cylindrical glass vessels having a capacity of approximately 0.2 litre and an average linear coefficient of thermal expansion of 4.9 (10^{-6} grd^{-1});
INTERMITTENT CRUCIBLE MELTING TO MAKE OPTICAL SPECIAL GLASSES (Reference Number 08-3.1/002);
CONTINUOUS MELTING PLANT FOR OPTICAL BULK

Sélection d'occasions de fabrication sous licence ou d'entreprises en participation

Instruments/314

Un fabricant d'Allemagne de l'Est offre à une compagnie canadienne les droits d'exploitation sous licence des instruments suivants:
RÉSEAUX DE PHOTODÉTECTEURS HYBRIDES À MULTIPASTILLES DE SILICIUM (Numéro de référence 33-2.4/002) utilisés dans un procédé intégré de montage et de mesure de pastilles de silicium planar épitaxial de photodétecteur sur des panneaux de connexion;
RÉFRACTOMÈTRE POUR LE PROCÉDÉ REMAT T (Numéro de référence 33-1.4/001) utilisé pour l'analyse en continu des liquides dans l'industrie chimique, en particulier dans les industries des fibres synthétiques, du pétrole, des boissons et de raffinage du sucre;
RÉFRACTOMÈTRE DE CONTRÔLE DU PROCÉDÉ REMAT 30 (Numéro de référence 33-1.4/002) modèle amélioré du REMAT-20 qui a été fabriqué et vendu dans le monde entier pendant un certain nombre d'années. Le nouveau modèle présente de meilleures caractéristiques car il exploite de nouveaux principes de fonctionnement, si bien qu'il se prête à un plus grand éventail d'utilisations.
DISQUES DE CALAGE (Numéro de référence 33-1.9/010) utilisés pour faire varier l'inclinaison d'un instrument par rapport à sa base; il s'agit de deux disques complémentaires en forme de coins, montés sur un même axe reliant l'instrument à sa base;
MESUREUR DE L'ÉCART DU CENTRE DE COURBURE (Numéro de référence 33-4.1/002) instrument exploitant la technique de l'image réfléchie pour mesurer l'écart du centre de courbure des composants optiques;
TESTEUR UNIVERSEL UEM DE LA PLANÉITÉ (Numéro de référence 33-4.2/002) utilisé pour la mesure des écarts par rapport à un marbre de pièces à surface usinées avec précision;
CONDENSEUR GAUFRÉ (Numéro de référence 33-1.9/011) dispositif optique assurant un éclairement plus uniforme du champ objet;
TOUR POUR LENTILLES DE FRESNEL (Numéro de référence 33-3.2/005) taille des lentilles de Fresnel en plastique d'un diamètre allant jusqu'à 400 mm, avec espacement des rainures variable entre 0,05 et 0,5 mm;
TOUR POUR LENTILLES DE FRESNEL PHOTOGRAPHIQUES (Numéro de référence 33-3.2/006) taille les lentilles de Fresnel originales en PMMA de diamètre extérieur allant jusqu'à 90 mm pour les viseurs d'appareils photographiques;
SYSTÈMES À VIDE POUR TUBES LASER (Numéro de référence 33-2.2/010) utilisés dans les lignes de production des tubes laser HeNe de faible puissance;
TRANSMISSION DU MOUVEMENT DANS UN CONTENANT SOUS VIDE ÉLEVÉ (Numéro de référence 33-1.9/013) méthode permettant la transmission mécanique d'un mouvement, de l'extérieur dans un contenant sous vide élevé;
MACHINE AUTOMATIQUE POUR FIXER DES ANSES À DES RÉCIPIENTS DE VERRE HAA 1200 (Numéro de référence 08-3.1/005) utilisée pour fixer des anses de verre à des récipients cylindriques d'une contenance d'environ 0,2 L et de coefficient linéaire moyen de dilatation thermique de 4,9 (10^{-6} grd^{-1});

GLASSES (Reference Number 08-3.1/001);
MANUFACTURE OF BLANKS AND RECTANGULAR PIECES OF GLASS IN A PLATINUM CRUCIBLE OF 65 LITRES CAPACITY (Reference Number 08-2.1/002).
Write: VEB Carl Zeiss Jena DDR, Export & Import Division, Licensing Department, Carl-Zeiss-Straße 1, DDR 69 Jena, German Democratic Republic and send a copy of your initial correspondence to 1) Mr. Fritz Zschernig, General Director, Marketing & Development Department, The Central Office of International License Commerce of the G.D.R., Schiklerstr. 57, 102 Berlin, German Democratic Republic and 2) Commercial Division, Canadian Embassy, Matejki 1/5, Srodmiescle, Warsaw, Poland.

PROCÉDÉ DE FUSION INTERMITTENTE AU CREUSET POUR LA FABRICATION DE VERRES OPTIQUES SPÉCIAUX (Numéro de référence 08-3.1/002);
USINE DE FABRICATION PAR FUSION CONTINUE DE VERRES OPTIQUES (Numéro de référence 08-3.1/001);
FABRICATION DE PIÈCES DE VERRE RECTANGULAIRES ET DE BLANCS DANS UN CREUSET DE PLATINE DE 65 LITRES (Numéro de référence 08-2.1/002).
Écrire à: VEB Carl Zeiss Jena DDR, Division du commerce extérieur, Département des licences, Carl-Zeiss-Strasse 1, RDA 69 Jena, République démocratique allemande et faire parvenir une copie de votre correspondance initiale à 1) M. Fritz Zschernig, Directeur général, Departement de la commercialisation et du développement, Bureau central du commerce international sous licence de la RDA, Schiklerstr. 57, 102 Berlin, République démocratique allemande et 2) Division commerciale, Ambassade du Canada, Matejki 1/5, Srodmiescle, Varsovie (Pologne).

Low Pressure Transducers/314

American manufacturer of piezoresistive transducers currently selling to the Canadian market is interested in licensing its technology in Canada under American Patents 4,025,942 and 4,016,644 relating to apparatus for making a low pressure transducer and the method of manufacturing transducers. Techniques included are covered by Canadian Patents 937,652 (Electromechanical Transducers and Housing) and 770,517 and 994,906 (Method for Fabricating Glass Backed Transducers and Glass Parts). It is claimed that the low pressure transducer field which employs piezoresistive bridges deposited of or diffused within a wafer of n-type silicon, can be relatively lucrative. The wafer is secured to a glass sheet and is then bonded to a silicon diaphragm of a relatively large size and fabricated from a distinct piece of silicon on non-critical electrical characteristics. Methods for producing a plurality of such devices by using compatible processing steps are also provided. Write: Mr. Arthur L. Plevy, Patent Counsel, P.O. Box 38, 281 Summerhill Road, East Brunswick, New Jersey 08816 and send a copy of your initial correspondence to Canadian Consulate General, 1251 Avenue of the Americas, New York City, N.Y. 10020-1175, U.S.A.

Transducteurs basse pression/314

Un fabricant américain de transducteurs piézorésistifs présentement disponibles sur le marché canadien offre la licence canadienne pour ses techniques relatives à l'équipement de fabrication de transducteurs basse pression et à la méthode de fabrication de ces transducteurs, protégées par les brevets américains 4,025,942 et 4,016,644. Les méthodes en question sont protégées par les brevets canadiens 937,652 (Transducteurs électromécaniques et boîtiers) et 770,517 et 994,906 (Méthode de fabrication de transducteurs à support en verre et de pièces en verre). On affirme que le marché des transducteurs faible pression, fabriqués au moyen de ponts piézorésistifs déposés sur une puce de silicium de type n ou diffusés dans celle-ci, peut être relativement lucratif. La puce est fixée sur une feuille de verre puis collée à un diaphragme en silicium relativement grand, fabriqué à partir d'une pièce de silicium dont les caractéristiques électriques sont peu critiques. La licence comprend aussi les méthodes de fabrication de nombreux dispositifs semblables suivant des étapes de traitement compatibles. Écrire à: M. Arthur L. Plevy, Patent Counsel, P.O. Box 38, 281 Summerhill Road, East Brunswick, New Jersey 08816 et faire parvenir une copie de votre correspondance initiale au Consulat général du Canada, 1251 Avenue of the Americas, New York City, N.Y. 10020-1175 (É.-U.).

Building Panels/314

Swedish company offers a licensing or joint venture agreement to a Canadian company for the manufacture of its patented building panels in Canada. The marketing rights in some other countries are possible. The system is produced in standard 1.2 m x 2.4 m panels and may be delivered as complete wall modules which contain windows and doors. The panels are lightweight having potential applications as bearing walls, partitions, roofs, ceilings and floors. Panel construction consists of polyester/sand exterior finishes integrally bonded to an open-celled corrugated core having high compression and shear strengths. The finished exterior surface is moisture-proof and may provide a wide range of appearances. The system is claimed to require no supplementary framing, painting, plastering or maintenance. Write: Polytex of Sweden AB, Box 2175,

Panneaux de construction/314

Une société suédoise offre à une entreprise canadienne un contrat de licence ou d'entreprise en commun en vue de la fabrication au Canada de ses panneaux de construction brevetés. Les droits de commercialisation dans certains autres pays sont disponibles. Les panneaux se présentent en dimensions courantes de 1.2 m sur 2.4 m et peuvent être livrés sous forme de pans de mur complets avec portes et fenêtres; ils sont légers et peuvent éventuellement être utilisés comme murs porteurs, cloisons, toits, plafonds et planchers. Les panneaux présentent une finition extérieure de polyester-sable intégralement liée à un noyau ondulé de composition cellulaire et ayant une forte résistance à la compression et au cisaillement. Cette finition extérieure est à l'épreuve de l'humidité et permet d'offrir un vaste éventail de finitions esthétiques. Il semble que ces pan-

S-550 02 Jonkoping, Sweden and send a copy of your initial correspondence to Commercial Division, Canadian Embassy, P.O. Box 16129, S-103 23 Stockholm 16, Sweden.

Concretes and Bonding Cements/314

American manufacturer offers licensing rights in all major metropolitan areas of Canada for the production of "QUIKRETE® " dry mix packaged concretes and/or "QUIKWALL® " fibreglass reinforced surface bonding cement. The QUIKRETE products manufacturing license includes the exclusive patented QUIKRETE mixer packer unit. In addition to the QUIKRETE mixer packer unit, periphery engineering and machinery such as dryers, palletizers, conveying equipment, bulk storage installation and building design and construction are available. Provided under the QUIKWALL license are trade mark, formulations and improvements, machinery set up and design, registration and listing in Sweet's Catalog, proven test results by the National Concrete Masonry Association and ASTM tests for waterproofing, wind-driven rain, strength and loading. This surface bonding cement material is a proven method of through wall construction using concrete blocks without mortar. Both licenses provide for continuing research and development and quality control through the QUIKRETE Technical Center located in Lithonia, Georgia. Part of both license agreements will be periodic submission of samples to the laboratory for evaluation. There will be no restriction on exportation of QUIKRETE or QUIKWALL products out of Canada to Europe or Asia. Write: The QUIKRETE® Companies, 1790 Century Circle, N.E., Atlanta, Georgia 30345 and send a copy of your initial correspondence to Canadian Consulate General, 900 Coastal States Building, 260 Peachtree Street, Atlanta, Georgia 30303-1290, U.S.A.

Disassemblable Boat Carrier and Launcher/314

American inventor offers a Canadian company the manufacturing and North American marketing rights under his U.S. Patent 4,214,774 for a boat carrier and launcher which enables the transporting of a car top boat between the automotive vehicle and the water, the launching of the boat on the water and the retrieval of the boat from the water by a single person. The longitudinal tongue of the boat carrier may be disassembled and the wheeled support section may be folded for compact storage on the boat. The storability of the boat carrier in either the automotive vehicle or on the boat while the boat is in use on the water eliminates the need for unnecessary trips between the water and the automobile vehicle. Also, an optional pivot plate fits into the handle section to allow one person to remove the car top boat from station wagons, sedans, etc. The boat carrier weighs 9.9 kg, its safe boat and equipment load is 135 kg and, in case of a boat accident, the carrier will float. As the boat carrier is pulled by hand only, the trailer hitch, license and extra insurance may be eliminated. (See illustration page 27.) Write: Mr. Ronald P. Kluge, 5902 Bustleton

neaux n'exigent aucune ossature ou travail de peinture, de plâtrage et d'entretien. Écrire à: Polytex of Sweden AB, Box 2175, S-550 02 Jonkoping (Suède) et faire parvenir une copie de votre correspondance initiale à la Division commerciale, Ambassade du Canada, C.P. 16129, S-103 23 Stockholm 16 (Suède).

Mélanges à béton et ciments de reprise/314

Un fabricant américain offre les droits de licence, dans toutes les métropoles du Canada, sur la production de mélanges à béton secs en sacs "QUIKRETE" et (ou) de ciment de reprise renforcé de fibre de verre "QUIKWALL® ". Les droits de fabrication des produits QUIKRETE couvrent l'ensacheuse-mélangeuse QUIKRETE. En plus de l'ensacheuse-mélangeuse, la technique et la machinerie associée (sécheuses, palletiteuses, transporteurs, installation de stockage en vrac, conception et construction du bâtiment) sont disponibles. La licence QUIKWALL comprend la marque de commerce, les formules et les améliorations, la conception et l'installation de la machinerie, l'enregistrement et le listage au catalogue de Sweet, les résultats prouvés d'essais effectués par la National Concrete Association et les essais ASTM d'étanchéité, d'imperméabilité à la pluie inclinée, de résistance et de mise en charge. Ce produit de reprise est une méthode prouvée de construction des murs à l'aide de blocs de béton non jointoyés au mortier. Les deux licences prévoient le suivi de la recherche et du développement ainsi que du contrôle de la qualité par le biais du centre technique QUIKRETE de Lithonia (Georgie). Dans le cadre des deux accords de licence, des échantillons devront être remis périodiquement au laboratoire pour être évalués. Il n'y aura aucune restriction sur l'exportation de produits QUIKRETE ou QUIKWALL du Canada vers l'Europe ou l'Asie. Écrire à: The QUIKRETE® Companies, 1790, Century Circle, N.E., Atlanta (Georgie) 30345 et faire parvenir une copie de votre correspondance initiale au Consulat général du Canada, 900 Coastal States Building, 260 Peachtree Street, Atlanta (Georgie) 30303-1290 (É.-U.).

Remorque démontable pour mise à l'eau de chaloupe/314

Un inventeur américain offre sous licence (brevet américain 4 214 774) à des compagnies canadiennes les droits de fabrication et de mise en marché d'une remorque de mise à l'eau pour chaloupe qui permet à une seule personne de porter jusqu'à un plan d'eau et de mettre à l'eau une chaloupe transportée sur le toit d'un véhicule. Le bras longitudinal de la remorque peut être démonté et les roues du chariot sont escamotables ce qui en permet le rangement dans un volume réduit sur la chaloupe. Le remisage de la remorque, soit dans le véhicule soit dans la chaloupe, élimine le va-et-vient entre le plan d'eau et le véhicule. Une plaque pivotante facultative qui s'emboîte dans le timon permet de plus à une seule personne de descendre la chaloupe du toit de la berline ou de la familiale. La remorque pèse 9,9 kg, peut porter une charge maximale de 135 kg et elle flotte. Puisque la remorque n'est déplacée qu'à la main les crochets d'attelage, plaques d'immatriculation et assurances supplémentaires ne sont pas nécessaires. (Voir l'illustration page 27). Écrire à: M. Ronald P. Kluge, 5902 Bustleton Avenue, Philadelphie (Pennsylvanie)

Avenue, Philadelphia, Pennsylvania 19149 and send a copy of your initial correspondence to Canadian Consulate General, 3 Parkway Building, Suite 1310, Philadelphia, Pennsylvania 19102, U.S.A.

Antifoam Agent/314

Hungarian State licensing agency offers its Canadian patent rights for a new commercially produced antifoam agent "Antihabzin" developed by the Chinoin Works for Pharmaceutical and Chemical Products, Budapest, which is a mixture of a known antifoam agent and of a polymer or copolymer consisting of an alkylene and/or alkylene oxide chain containing hydrophile groups that propagate synergically the highly inherent antifoam property of polypropylene glycol. The essence of the synergic effect is the ability of the mixture to maintain a non-ordered state in the foam lamellas more permanently and thereby to increase surface tension. It has an efficiency several times higher than that of customary antifoam materials. Its applications are: An antifoam preparation of optimum composition can be selected in principle for any fermentation system; may be added at any stage of the fermentation process; is sufficient to add 1/10 to 1/20 of the quantity of conventional antifoam agents resulting in a cost reduction; owing to the improved oxygen-transfer factor the unit number of fermentation is increased by 15 to 30 per cent; the useful volume of the fermentor can be increased. Write: Novex Co. Ltd., P.O. Box 62, H-1364 Budapest, Hungary and send a copy of your initial correspondence to the Commercial Division, Canadian Embassy, Budakeszi ut 55/dP/8, 1021 Budapest, Hungary.

Hard Water Resistant Surfactants/314

Hungarian State licensing agency offers licensing rights under the U.S. patent to Canadian companies for the production of hard water resistant surfactants containing the carboxyl group, the calcium and magnesium salts of the new surface active agents being soluble in water. This property is due to their structure since their functional part is a non-ionic type surface active compound appropriately transformed into an anionic type surface active agent with carboxyl group. The carboxyl group can be in primary or secondary position. Developed and manufactured on large scale by Chinoin Works for Pharmaceutical and Chemical Products, Budapest, the new surfactants are the appropriately modified derivatives of alkylphenolpolyglycolethers and of fatty acid polyglycolesters. They have the following advantages: Wide range of application in aqueous systems; being of an acidic character they can be used with advantage where acidic medium is required; by choosing the most suitable agent the pH of the system thus formed can be varied between 3 - 6, i.e., it can be adjusted within this range to the required value; can be combined with other non-ionic and anionic surfactants; antistatic effect; when dispersing powders in organic and aqueous medium excellent wetting properties; can be easily manufactured in a conventional reactor; raw materials for the production easily available. Application is in the preparation of plant protectives (EC, WP and WSC

19149 et faire parvenir une copie de votre correspondance initiale au Consulat général du Canada, 3 Parkway Building, Suite 1310, Philadelphie (Pennsylvanie) 19102 (É.-U.).

Agent anti-mousses/314

L'agence d'octroi de licence de l'État Hongrois offre les droits d'exploitation sous licence de son brevet canadien d'un nouvel agent anti-mousses produit commercialement, l'"Antihabzin", mis au point par l'usine Chinoin pour les Produits pharmaceutiques et chimiques de Budapest. Il s'agit du mélange d'un agent anti-mousses connu et d'un polymère ou d'un copolymère constitué d'une chaîne d'alkylène et/ou d'oxyde d'alkylène contenant des groupements hydrophiles qui propagent de façon synergique la propriété anti-mousses fortement inhérente au propylèneglycol. L'effet synergique est dû essentiellement à la capacité du mélange de maintenir de façon plus permanente les lamelles de mousse dans un état de désordre, et, par conséquent, d'augmenter la tension superficielle. Le mélange en question possède une efficacité plusieurs fois plus grande que les matériaux anti-mousses habituels. Ses applications comprennent: choix possible en principe d'une préparation anti-mousses de composition optimale pour tout système de fermentation; possibilité d'addition à n'importe quel stade la fermentation; l'addition du 1/10 au 1/20 de la quantité des agents anti-mousses conventionnels suffit, d'où, réduction des coûts; augmentation de 15 à 30 % de l'indice de fermentation par accroissement du facteur de transfert d'oxygène; possibilité d'augmentation du volume de la cuve à fermentation. Écrire à: Novex, B.P. 62, H-1364 Budapest (Hongrie) et faire parvenir une copie de votre correspondance initiale à la Division commerciale, Ambassade du Canada, Budakeszi ut 55/dP/8, 1021 Budapest (Hongrie).

Surfactifs résistants à l'eau dure/314

L'agence d'octroi de licence de l'État Hongrois offre à des compagnies canadiennes les droits d'exploitation sous licence de son brevet américain de surfactifs résistants à l'eau dure contenant le groupement carboxyle. Les sels de calcium et de magnésium de ces nouveaux agents sont solubles dans l'eau. Cette propriété provient de leur structure, car la partie fonctionnelle provient de la transformation appropriée d'un composé tensio-actif de type non-ionique en un agent de surface anionique à groupement carboxyle. Ce dernier peut se trouver en position primaire ou secondaire. Développés et fabriqués sur une grande échelle par Chinoin pour les Produits pharmaceutiques et chimiques de Budapest, ces nouveaux surfactifs sont des dérivés d'éthers d'alkylphénolpolyglycoliques et d'ester d'acides gras polyglycoliques modifiés adéquatement. Ils ont les avantages suivants: grande plage d'utilisation dans les milieux aqueux; ayant un caractère acide, ils peuvent servir avantageusement lorsqu'un milieu acide est requis; en choisissant l'agent le plus approprié, on peut faire varier le pH du système obtenu entre 3-6 (on peut l'ajuster à la valeur requise à l'intérieur de la plage indiquée); on peut les combiner à d'autres surfactifs non-ioniques et anioniques; effets antistatiques; pour la dispersion de poudres dans un milieu organique et aqueux, ils ont d'excellentes propriétés mouillantes; on peut facilement les préparer dans un réacteur conventionnel; les matières premières servant à la

formulas); as wetting and dispersing agents, primarily in the paint industry; in the form of salts with organic or inorganic bases for producing W/O type emulsions, flowable suspensions, etc. Write: Novex Co. Ltd., P.O. Box 62, H-1364 Budapest, Hungary and send a copy of your initial correspondence to the Commercial Division, Canadian Embassy, Budakeszi ut 55/dP/8, 1021 Budapest, Hungary.

production sont facilement accessibles. La demande couvre la préparation de formules (poudres mouillables, concentrés émulsifiables et concentrés hydrosolubles) servant à protéger des plantes; l'utilisation comme agents mouillants et dispersants, surtout dans l'industrie de la peinture; la production d'émulsion du type eau/huile, de suspensions capables de s'écouler, etc., sous forme de sels de bases organiques ou inorganiques. Écrire à: Novex, B.P. 62, H-1364 Budapest (Hongrie) et faire parvenir une copie de votre correspondance initiale à la Division commerciale, Ambassade du Canada, Budakeszi ut 55/dP/8, 1021 Budapest (Hongrie).

Sound Level Meter/314

British company offers the manufacturing and North American marketing rights in Canada to a convertible grade, sound level meter. The selection of plug-ins allows a single instrument to operate in different precision modes as defined by U.S. standards ANS1-1 to ANS1-3. The modular design features a variety of interchangeable elements: microphones, vibration measurement modules, sound filters, sound integrators, digital readouts, tachometers, etc. This hand-held instrument system is stated to be capable of meeting the measurement requirements of environmental health, industrial safety, product measurement, and legal enforcement. (See illustration page 27.) Write: Cirrus Research Limited, 1 York Place, Scarborough, North Yorkshire, England Y011 2NP and send a copy of your initial correspondence to Commercial Division, Canadian High Commission, One Grosvenor Square, London W1X 0AB, England.

Sonomètre/314

Une société britannique offre les droits de fabrication au Canada et les droits nord-américains de commercialisation d'un sonomètre multifonction. Une série d'éléments enfichables permettent à l'appareil de fonctionner dans différents modes de précision, définis par les normes américaines ANSI-1 à ANSI-3. La conception modulaire permet d'utiliser une série d'éléments interchangeables comme, par exemple, des microphones, des modules vibromètres, des filtres acoustiques, des intégrateurs acoustiques, des affichages numériques, des tachymètres, etc. On affirme que cet appareil portatif peut satisfaire aux exigences de mesures de l'environnement sonore à des fins médicales, de mesures relatives à la sécurité industrielle, de mesures effectuées sur des produits et de mesures visant à l'application d'une loi. (Voir l'illustration page 27). Écrire à: Cirrus Research Limited, 1 York Place, Scarborough, North Yorkshire (Angleterre) Y011 2NP et faire parvenir une copie de votre correspondance initiale à la Division commerciale, Haut-commissariat du Canada, 1 Grosvenor Square, Londres W1X 0AB (Angleterre).

Screwdriver and Screw for Use Therewith/314

The screw has a normal straight side slot for efficient application of torque and tapered central hole which engages with a tapered pin on the driver to hold the screw on the driver. This allows one hand operation and facilitates the use of machine drivers on screws which can still be worked with ordinary drivers. This is of great advantage for the assembly of equipment that will be sold to areas where special drivers may not be available. The principal features are the use of the most efficient means of transmitting torque to the screw and separation of the driving and screw holding surfaces so that distortion of the driving surfaces will not affect the screw holding action. **PATENT 1,078,229.** Write: Mr. James R. Johnson, 152 Mapleleaf Estates, Port Charlotte, Florida 33952 until March 31, 1982. After March 31st, write to Mr. Johnson at Hillcrest, R.R. 3, Brockville, Ontario K6V 5T3 and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Tournevis et vis correspondante/314

Il s'agit d'une vis à tête fendue qui comporte, en son centre, un trou conique destinée à recevoir la tige conique située à l'extrémité plate du tournevis. Le tournevis retient la vis pour permettre la pose d'une main et l'application d'un couple maximal. Par ailleurs, la vis se pose aussi bien avec un tournevis ordinaire qu'avec le tournevis spécial correspondant; cela constitue un atout certain pour le montage d'éléments vendus dans des régions où il peut être difficile de trouver le tournevis spécial. Les principaux avantages de l'invention sont les suivants: le tournevis exerce un couple maximal sur la vis et la retient en tout temps même si l'empreinte d'entraînement est déformée parce que celle-ci et la surface de retenue sont distinctes. **BREVET 1 078 229.** Écrire à: M. James R. Johnson, 152 Mapleleaf Estates, Port Charlotte (Floride) 33952 (jusqu'au 31 mars 1982). Après le 31 mars 1982, écrire à M. Johnson à Hillcrest, r.r. 3, Brockville (Ontario) K6V 5T3 et faire parvenir une copie de votre correspondance initiale à la Section des possibilités de licences (34/3), Centre des entreprises, ministère de l'Industrie et du Commerce, Ottawa (Ontario) K1A 0H5.

Ground Plane Corner Radar Reflector/314

Australian R.A.A.F. development is offered to a Canadian company under exclusive or non-exclusive licensing arrangements. Patents are issued in Australia, U.S.A., U.K., and applications are pending in West Germany, France and Holland. This reflector is a new type of radar reflector for use by airborne radars as an airfield location beacon and approach aid. The GPC reflector differs from traditional trihedral reflectors in that it uses the ground as one of the reflecting surfaces, the other two being formed by the reflecting panels themselves. This type offers a number of advantages. There is an absence of interference nulls in the vertical plane, it is responsive to circularly as well as linearly polarised signals, it can provide a large echo while being made as a low profile structure and thus can be installed close to runways without being a safety hazard. The reflectors also possess a potential in ground marker applications for use by radar equipped planes and the principle is relevant to marine applications where the sea surface, instead of the ground, forms the third side of the reflector. Marine beacons have demonstrated the feasibility of their use in conjunction with ships' radars. Write: Ms. Julienne R. Boston, Patents & Licensing Officer, Patents & Licensing Section, Department of Industry and Commerce, Anzac Park West Building, Constitution Avenue, Canberra A.C.T. 2600, Australia and send a copy of your initial correspondence to Commercial Division, Canadian High Commission, Commonwealth Avenue, Canberra A.C.T. 2600 Australia.

Réflecteur radar dièdre à plan de sol/314

L'Australie offre à une entreprise canadienne les droits de licence exclusifs ou non exclusifs d'une invention mise au point par la Royal Australian Air Force. L'invention est protégée par des brevets en Australie, aux États-Unis et au Royaume-Uni et des demandes de brevet sont en instance en Allemagne de l'Ouest, en France et aux Pays-Bas. Il s'agit d'un nouveau type de réflecteur radar devant servir de balise de répérage des aérodromes et d'aide d'approche aux aéronefs munis du radar. Ce réflecteur se distingue des réflecteurs trièdres traditionnels en ce qu'il utilise la surface du sol comme l'une des surfaces réfléchissantes, les deux autres étant formées par les panneaux réfléchissants. Cette conception offre plusieurs avantages: il n'y a pas de zéros d'interférence dans le plan vertical, le réflecteur réagit tout autant aux signaux à polarisation circulaire qu'à polarisation linéaire, le réflecteur produit un écho de grande taille tout en pouvant être une structure de faible profil et peut donc être installé près des pistes d'atterrissage sans menacer la sécurité. Les réflecteurs pourraient aussi servir de balises de sol pour les avions équipés de radars et certaines applications sont aussi possibles dans le domaine maritime, la surface de l'océan formant alors le troisième côté du réflecteur, plutôt que le sol. Des expériences ont démontré la faisabilité de l'utilisation de ces réflecteurs comme radiophares de marine avec les radars de navire. Écrire à: Ms. Julienne R. Boston, Patents & Licensing Officer, Patents & Licensing Section, Department of Industry and Commerce, Anzac Park West Building, Constitution Avenue, Canberra A.C.T. 2600 (Australie) et faire parvenir une copie de votre correspondance initiale à la Division commerciale, Haut-commissariat du Canada, Commonwealth Avenue, Canberra A.C.T. 2600 (Australie).

Canadian Patents Available for Licensing or Sale in Canada Issued January 1982

Liste des brevets canadiens disponibles pour octroi de licence ou vente au Canada délivrés en janvier 1982

Note:
Résumés of the following Canadian Patents are published in the language of application, English or French.

Note:
Des résumés des brevets canadiens ci-joints sont publiés dans la langue de la demande de brevet, en anglais ou en français.

Toothbrush/314

Brosse à dents/314

Dispenser-container brush for paste material, comprising: a) a stem or handle having a flexible wall, internally hollow reservoir portion, an intermediate zone provided with means for the engagement of a bristle holder head member; and a substantially rigid elongated portion, said elongated portion having a dispensing opening for the paste material; b) a substantially rigid bristle holder head member, having a bristle arrangement on an outer side or face and comprising an inner cavity of shape and size substantially corresponding to those of said elongated handle portion: a portion for engagement in said means on the intermediate handle portion, and a dispensing hole for the paste material in the face or side provided with said bristles, the position of said dispensing hole being such that the hole can be brought in register with said dispensing opening in the handle. **PATENT 1,115,468.** Write: Secunda Ag fur Vermietung von Wirtschaftsgutern, Antonigasse 4, 5620 Bremgarten, Switzerland and send a copy of your initial correspondence to Commercial Division, Canadian Embassy, Kirchenfeldstrasse 88, 3005 Berne, Switzerland.

Method of Processing Aluminous Ores/314

Méthode de traitement des minerais d'aluminium/314

A method of producing aluminum chloride from aluminous materials containing compounds of iron, titanium and silicon comprising reacting the aluminous materials with carbon and a chlorine-containing gas at a temperature of about 900°K to form a gaseous mixture containing chlorides of aluminum, iron, titanium and silicon and oxides of carbon; cooling the gaseous mixture to a temperature of about 400°K or lower to condense the aluminum chlorides and iron chlorides while titanium chloride and silicon chloride remain in the gas phase to effect a separation thereof; heating the mixture of iron chlorides and aluminum chlorides to a temperature of about 800°K to form gaseous aluminum chlorides and iron chlorides; passing the heated gases into intimate contact with aluminum sulfide to precipitate solid iron sulfide and to form additional gaseous aluminum chlorides; and separating the gaseous aluminum chloride from the solid iron sulfide. **PATENT 1,115,489.** Write: Mr. James E. Denny, Assistant General Counsel for Patents, Office of the General Counsel, U.D. Department of Energy, Washington, D.C. 20545 and send a copy of your initial correspondence to Canadian Consulate General, 3 Parkway Building, Suite 1310, Philadelphia, Pennsylvania 19102, U.S.A.

Fuel Gas Desulfurization/314

Désulfuration des gaz combustibles/314

A method for removing sulfurous gases such as H_2S and COS from a fuel gas is disclosed wherein limestone particulates containing iron sulfide provide catalytic absorption of the H_2S and COS by the limestone. The method is effective at temperatures of 400°C to 700°C in particular. **PATENT 1,115,493.** Write: Mr. James E. Denny, Assistant General Counsel for Patents, Office of the General Counsel, U.S. Department of Energy, Washington, D.C. 20545 and send a copy of your initial correspondence to Canadian Consulate General, 3 Parkway Building, Suite 1310, Philadelphia, Pennsylvania 19102, U.S.A.

Apparatus for the Vaporization of Elemental Sulfur by Means of Carrier Gas/314

Appareil pour la vaporisation de soufre élémentaire à l'aide d'un gaz porteur/314

An apparatus for the vaporization of elemental sulfur by means of carrier gas, the apparatus comprising a thermally insulated outer vessel for melting elemental sulfur which is provided with heating means, a stirrer and an inlet port for elemental sulfur, and at least one inner vessel inside the outer vessel and in communication with said outer vessel, the inner vessel(s) being provided with heating means, a stirrer, carrier gas feed means and an outlet port for sulfur vapors, said inner vessel(s) for vaporizing molten elemental sulfur received from the outer vessel together with carrier gas. The apparatus is simpler and more economical in terms of energy than previously known apparatuses. **PATENT 1,115,497.** Write: Outokumpu Oy, Toolonkatu 4, P.O. Box 280, SF-00101 Helsinki 10, Finland and send a copy of your initial correspondence to Commercial Division, Canadian Embassy, Pohjois Esplanadi 25B, 00100 Helsinki 10, Finland.

Basement Wall Draining Molding/314 **Moulure de drainage pour murs de sous-sol/314**

A basement wall drain unit for removing moisture from a basement wall formed of concrete blocks resting on a footing adjacent to a concrete basement floor, wherein the concrete floor is poured against the drain unit so that a space is formed between the drain unit and an inner surface of the wall and between the drain unit and the footing into which moisture may drain from the interior of the wall through drain passages in the wall and then down beneath the basement floor to a weeping drain. **PATENT 1,115,536.** Write: Scarfone Construction Ltd., 1359 Reaume Road, Windsor, Ontario N9J 1C3 and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Soil Amending Mixture/314 **Composition pour l'amendement des sols/314**

A process for preparing improved soil amending mixtures by adding coal materials and organic matter thereto. Low grade coal materials are crushed, screened and exposed to a number of wetting and drying cycles followed by a thorough leaching to produce therefrom sorptive humus materials. The humus material is separated to provide a first portion fine particulate sorptive humus material having a maximum diameter passing through a 200 mesh screen, and a larger sized sorptive humus material having a maximum diameter of 1.8 mm. In a first embodiment a carbon-rich fully matured humus is produced by the removal of water soluble and extraneous adhering substances and gases content of the coal material. A biological inoculation of the humus is effected by exposing the humus in stockpiles thereof to the natural elements of the environment. The first portion sorptive humus is applied to the soil wherein the surface bacteria thereon effects the breakdown of soil organic matter to provide fertilizer products therefrom. In a second embodiment the second portion larger sized humus material is used as a filter medium and an organic solids waste stream is directed therethrough to remove the solids therefrom and accumulate the organic solids therein. The filter medium and organic solids mixture is comminuted then mixed in a heated mixer-agitator under controlled conditions to enhance the bacterial population, stockpiled exposed to the natural environmental elements to effect the degradation of organic solids therein, then pasteurized to remove bacteria and pathogens therefrom and pelletized. A soil amending product having neutralizing properties is produced thereby. In a third embodiment the first portion sorptive humus is inter-mixed with septic and odorous bacteria and pathogen-containing organic liquid waste effluent having an alkaline pH and utilized to enhance the quality of the liquid mixture. The liquid mixture is applied to soils as a soil amending mixture and a resource and energy conservation mixture. **PATENT 1,115,539.** Write: Cyril T. Jones, 8413 Lochside Drive, R.R. 1, Saanichton, B.C. and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Ductile Long Range Ordered Alloys with High Critical Ordering Temperature and Wrought Articles Fabricated Therefrom/314

Alliages ductiles à structure ordonnée de portée étalée à température critique élevée d'ordination, et articles faits desdits alliages/314

Malleable long range ordered alloys having high critical ordering temperatures exist in the $V(Fe, Co)_3$ and $V(Fe, Co, Ni)_3$ systems. These alloys have the following compositions comprising by weight: 22-23° V, 14-30° Fe, and the remainder Co or Co and Ni with an electron density no more than 7.85. The maximum combination of high temperature strength, ductility and creep resistance are manifested in the alloy comprising by weight 22-23% V, 14-20% Fe and the remainder Co and having an atomic composition of $V(Fe_{.20-.26}Co_{.74-.80})_3$. The alloy comprising by weight 22-23% V, 16-17% Fe and 60-62% Co has excellent high temperature properties. The alloys are fabricable into wrought articles by casting, deforming, and annealing for sufficient time to provide ordered structure. Alloys of the subject composition range are useful as structural components in apparatus where high strength and creep resistance are required at elevated temperatures. **PATENT 1,115,561.** Write: Mr. James E. Denny, Assistant General Counsel for Patents, Office of the General Counsel, U.S. Department of Energy, Washington, D.C. 20545 and send a copy of your initial correspondence to Canadian Consulate General, 3 Parkway Building, Suite 1310, Philadelphia, Pennsylvania 19102, U.S.A.

Ferritic FE-Mn Alloy for Cryogenic Applications/314

Alliage ferritique de Fe-Mn pour usage en cryogénie/314

A ferritic, nickel-free alloy steel composition, suitable for cryogenic applications, which consists essentially of about 10-13% manganese, 0.002-0.01% boron, 0.1-0.5% titanium, 0-0.05% aluminum and the remainder iron and incidental impurities normally associated therewith. **PATENT 1,115,562.** Write: Mr. James E. Denny, Assistant General Counsel for Patents, Office of the General Counsel, U.S. Department of Energy, Washington, D.C. 20545 and send a copy of your initial correspondence to Canadian Consulate General, 3 Parkway Building, Suite 1310, Philadelphia, Pennsylvania 19102, U.S.A.

Viscous Liquid Distributor/314

Débiteur de liquide visqueux/314

A distributor for viscous liquid fertilizer includes a casing with a flat top and frusto-conical bottom end defining a chamber the lower end of which is divided into compartments by radially extending partitions; a hollow cone spray nozzle in the top end of the casing for spraying fertilizer into the chamber and evenly distributing the fertilizer in the compartments; and an outlet duct in the bottom end of each compartment for discharging the fertilizer from the distributor. **PATENT 1,115,600.** Write: Jim Shaner, 5B, 925-30 Street, N.E., Calgary, Alberta T2A 5L4 and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Refuse Storage and Discharge Apparatus/314

Installation de stockage et de décharge d'ordures/314

Rear discharge refuse collecting vehicle has a refuse container packed, for example, by a hydraulic packer mechanism in a pivotally mounted tailgate. A refuse pushing member is mounted for sliding movement by an inclined hydraulic refuse pushing ram to push refuse out of the container under the raised tailgate. The refuse pushing ram acts between the refuse pushing member and a short upstanding hollow fabricated steel cantilever just behind the vehicle cab at the front of the container. The cantilever is mounted on a support frame under the refuse container, and extends into a recess defined by a rearwardly sloping lower portion of the refuse pushing member whereby the antilever occupies no space which would have been available for refuse, and the refuse pushing member can be fully retracted to the front of the refuse container and the container itself is not stressed by the ram. **PATENT 1,115,664.** Write: Hestair Eagle Limited, Eagle Works, The Saltisford, Warwick, England and send a copy of your initial correspondence to Commercial Division, Canadian High Commission, One Grosvenor Square, London W1X 0AB, England.

Method for Erecting a Temporary Encampment/314

Méthode de construction d'un campement provisoire/314

L'invention a pour objet une méthode de construction d'un campement provisoire sur des lieux choisis par simple et rapide assemblage d'un ensemble d'éléments modulaires facilement transportables comprenant un nombre pair de modules de base ayant chacun une entrée à une extrémité, au moins un module de plancher, et deux modules formant vestibule et ayant sensiblement la même largeur que chaque module de plancher. Selon cette méthode, on dispose tout d'abord les modules de base face à face et côte à côte sur les lieux choisis de façon à former un corridor. On dispose ensuite chaque module de plancher entre les modules de base de façon à réunir ces derniers à la base et on dispose les deux modules formant vestibule aux extrémités du corridor formé de façon à fermer celui-ci. On réunit ensuite les modules de base adjacents d'un même côté du corridor à l'aide d'une bande mince de matériau souple et étanche fixable de façon réversible et rapide sur les parois avant, de dessus et arrière de chaque module de base. On forme alors un double toit étanche sur toute la longueur du corridor en fixant de façon réversible et rapide une première bande large de matériau souple ayant sensiblement la largeur du corridor au dessus de ce dernier entre les extrémités supérieures des parois avant des modules de base, et une seconde bande large de matériau souple et étanche ayant une largeur supérieure à celle du corridor, au dessus de la première bande entre les parois de dessus des modules de base. On réunit enfin les modules formant vestibule aux modules de base et au double toit étanche aux extrémités du corridor de la même façon que l'on réunit chaque paire de modules de base adjacent entre eux. Le principal avantage de cette méthode réside dans la façon d'attacher les modules entre eux à l'aide de bandes de matériau souples et étanches fixables aux modules avec, par exemple, des agraffes et des lacets. Ceci permet en effet l'installation rapide et à faibles coûts de locaux d'habitation sécuritaires, confortables et hygiéniques qui peuvent être utilisés dès le premier jour de leur arrivée sur les lieux et être facilement récupérés en vue d'une réutilisation ultérieure. L'invention a également pour objet le campement provisoire obtenu selon cette méthode. **BREVET 1,115,920.** Écrire à: Jozsef M. Kovacs, 335, avenue Kensington, Westmount (Québec) H3Z 2H2 et faire parvenir une copie de votre correspondance initiale à la Section des possibilités de licences (34/3), Centre des entreprises, ministère de l'Industrie et du Commerce, Ottawa, Ontario K1A 0H5.

Pantograph/314

Pantographe/314

This invention is concerned with a pantograph comprising a support post rotatably mounted in a base, a first arm extending perpendicular to the post and a second arm extending perpendicular to the post and parallel to the first arm. The first arm is mounted onto the post to rotate with it and to translate with respect to it. The second arm is mounted on the post to rotate with, and with respect to it. A follower member is fixed on the first arm and a tracing member is slidably mounted on the second arm. Suitable gear means convert translation of the first arm into translation of the tracing member along the second arm. This improved pantograph is particularly useful in that it allows for modification of the angle existing between the first and second arms and accordingly of the positions where must be placed the drawing to be reproduced and the sheet of paper on which this drawing must be reproduced, without modifying the capacity of reproduction of the pantograph. **PATENT 1,115,943.** Write: Jean-Paul Blain, 7754, Des Erables, Montreal, Quebec I3C 3P6 and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Method and Device for Filling a Container with a Predetermined Amount of Liquid/314

Procédé et dispositif pour déposer dans un récipient une dose prédéterminée d'une substance liquide/314

Un procédé et un dispositif pour déposer dans un récipient une dose prédéterminée d'une substance liquide. Le dispositif comporte un pipette munie d'un piston pour prélever une quantité de substance, un manchon de refroidissement du tube inférieur de la pipette et des moyens pour couper le cordon de substance gelée sortant du tube calibré lorsqu'on applique une pression sur le piston. L'invention est applicable au dosage de réactifs dans les analyses de laboratoire. **BREVET 1,115,984.** Écrire à: Jean Guigan, 9, rue Jean Mermoz, 75008 Paris (France) et faire parvenir une copie de votre correspondance initiale à la Division commerciale, Ambassade du Canada, 35, avenue Montaigne, 75008 Paris (France).

Method of Heparinizing a Charged Surface of a Medical Article Intended for Blood Contact/314

Méthode pour héparíniser la surface chargée d'un article d'usage médical devant entrer en contact avec le sang/314

A charged surface of a medical article intended for blood contact can be heparinized by being contacted with a collodial aqueous solution of a complex compound of heparin and cationic surfactant, the particles of the collodial solution having attached to their surfaces charges of a polarity opposite to that of the charges of the article. **PATENT 1,116,086.** Write: I.R.D. Biomaterial Aktiebolag, Box 20105, 161 20 Bromma, Sweden and send a copy of your initial correspondence to Commercial Division, Canadian Embassy, P.O. Box 16129, S-103 23 Stockholm, Sweden.

Dispensing Device for Windshield Washer Liquid/314

Distributeur de lave-glace/314

A dispensing device for windshield washer liquid is disclosed, comprising a generally box-shaped casing having a puncturing tooth in its bottom wall and an aperture communicating with a receptable attached to the underside of the bottom wall which in turn communicates with the windshield liquid pump of a motor vehicle. An ordinary store-bought container is placed in the casing and thus punctured and the liquid feeds by gravity into the receptable and thence to the pump. **PATENT 1,116,131.** Write: Adrien Bastien, 1835, Chemin St. Roch, R.R. No. 1, St-Louis-de-Terrebonne, Québec J0N 1N0 and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Universal Tote and Storage Container for Skis and Associated Equipment as Well as Other Items that Will Fit Into the Case/314

Étui de transport et de rangement de skis et de leurs accessoires, ainsi que d'autres articles qu'il pourrait contenir/314

In this invention a container has been designed for transporting skis, bindings, poles, boots, all clothing and related accessories for the sport of skiing. The container is constructed of light-weight, strong, durable material to protect its contents against the environment such as road salt, grime and theft and is capable of being hand carried, shoulder slung, pulled on casters on the ground or as a toboggan on the snow, has built in fittings included for car top transport singly or in plurality as well as a nesting feature for stacking containers on public transportation systems such as buses, trains and aeroplanes. Out of season storage of all ski equipment is provided and centralized in this container. Alternative uses are a universal carrier for any items that will fit within such as hunting, fishing, scuba diving, hockey, camping, tools, hand luggage with clothes, cosmetic case and the like. Everything is contained in one container which adapts to any mode of transportation. **PATENT 1,116,141.** Write: James A. Brown, 230 Kimpton Avenue, Rosemere, Quebec J7A 2J2 and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Volley Tennis Game/314

Jeu de tennis de type volleyball/314

Each of a pair of portable basket members is held by a corresponding player of a corresponding one of two teams. A plurality of ball striking members are held by the remaining players of the teams. Each ball striking member comprises a frame having a net of cord-like members supported therein in matrix configuration. The ball striking members are used to strike a ball of volley ball size in attempting to hit the ball into the basket member of the other team, thereby combining tennis and volley ball into a new game which provides great interest, entertainment and exercise for the players. **PATENT 1,116,196.** Write: Gloria J. DeAngelis, 54-12 82nd Street, Elmhurst, New York 11373 and send a copy of your initial correspondence to Canadian Consulate General, 1251 Avenue of the Americas, New York City, N.Y. 10020-1175.

Matrix Type Switching Device/314

Dispositif de commutation de type matriciel/314

La présente invention est relative à la commutation de signaux à faible niveau et large bande tels que les signaux de transmission téléphonique. Elle concerne un dispositif de commutation dont les points de commutation sont disposés selon un réseau de matrices élémentaires présélectionnées à l'aide de sélecteurs. Elle a pour objet des points de commutation à diodes pour les sélecteurs et pour les matrices élémentaires tels que le fonctionnement des points de commutation des sélecteurs soit asservi à celui des points de commutation des matrices élémentaires ce qui supprime la nécessité d'une commande particulière pour les sélecteurs. Elle s'applique avantageusement à la technique des transmissions. **BREVET 1,116,282.** Écrire à: Compagnie Industrielle des Télécommunications Cit-Alcatel, 12, rue de la Baume, 75008 Paris (France) et faire parvenir une copie de votre correspondance initiale à la Division commerciale, Ambassade du Canada, 35, avenue Montaigne, 75008 Paris (France).

Apparatus and System for Wireless Reception and Transmission of Coded Audio and/or Sonic Alarm Signals/314

Appareil et système d'émission et de réception sans fil de signaux d'alarme codés audio et/ou sonores/314

The Apparatus and System for Wireless Reception and Transmission of Coded Audio and/or Sonic Alarm Signals mobilizes people, by sounding an audible alarm, without the need for interconnecting wiring throughout the system. The advancement in this art is accomplished by several factors: 1) By the use of coded audio signals, 2) The absence of radio waves, thus the absence for licensing, 3) A combination of audio alarm signals within hearing range, with coded transmission and reception of other related data, in a broader sonic range, for further processing, 4) The absence of extensive labour for wiring. The invention finds a utility in a broad range of alarm detecting, transmitting and receiving equipment and systems, such as fire, smoke, gas, holdup, burglary, telemetery and control apparatus. As an illustration, one of the many applications of the said Apparatus and System, is described in conjunction with a conventional smoke detector. With the existing technology when a smoke detector is triggered by fire, all others are triggered via interconnecting wires, as well as the alarm monitoring and control unit, as a system. This invention accomplishes both the detection and the transmission of the alarm without wiring. When any one of the smoke detectors is triggered, it will sound an audible alarm and simultaneously transmit a coded signal to all other detectors in the system and to the central control and monitoring unit, to sound a general alarm within the whole system. **PATENT 1,116,284.** Write: George S. Sagi, 15 Ramsgate Bay, Winnipeg, Manitoba R3P 0V3 and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Method and Apparatus for Producing an Inalterable Magnetic Recording/314

Procédé et dispositif d'enregistrement, magnétique inaltérable/314

Procédé d'orientation et de fixation dans une direction déterminée des particules magnétiques contenues dans une encre polymérisable étendue sur un support caractérisé par les opérations suivantes: le support est acheminé vers une zone soumise à un champ magnétique dont la direction et le sens sont réglés en fonction du temps selon le message à inscrire, le support traversant cette zone à une vitesse réglable, et pendant cette traversée, l'encre déposée sur le support est polymérisée au moyen d'une radiation lumineuse atteignant une partie seulement de la zone soumise au champ magnétique, cette partie correspondant à celle qui est traversée en dernier par ledit support encré. **BREVET 1,116,289.** Écrire à: TRANSAC - Compagnie pour le Développement des transactions Automatiques, 29, rue Emeriau, 75015 Paris (France) et faire parvenir une copie de votre correspondance initiale à la Division commerciale, Ambassade du Canada, 35, avenue Montaigne, 75008 Paris (France).

Apparatus and a Method for Biological Treatment of Waste Waters/314

Appareil et méthode de traitement biologique des eaux usées/314

An apparatus and a method for biological treatment of waste waters achieving biological oxidation of organic matter, biological nitrification and denitrification of nitrogenous compounds and biological removal of phosphorus and clarification of the treated waste water in a single reaction tank in a single suspended growth sludge system without the use of traditional compressors, mixers, recirculation pumps, piping and valving and without the use of the traditional clarifier. **PATENT 1,116,323.** Write: Ferdinand Besik, 3243 Chokecherry Crescent, Mississauga, Ontario L5L 1B1 and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Tooth Paste Permitting the Control of the Brushing Time of the Teeth/314

Pâte dentifrice permettant un contrôle du temps de brossage des dents/314

Pâte dentifrice contenant des substances réactives permettant de contrôler le temps de brossage des dents par le changement de couleur qui se produit après un temps déterminé de brossage, les substances réactives comprenant essen-

tiellement un tampon citrate/acide citrique de molarité comprise entre 0,07 et 0,35 M avec un pH compris entre 4 et 5,5 au dosage de 10 à 50% et du rouge de chlorophénol au dosage de 0,02 à 0,1 pour cent. **BREVET 1,116,528.** Écrire à: S.A. Cooper, 1701 Fribourg/Moncor (Suisse); Jacques Assal, Avenue du Théâtre 7, 1005 Lausanne (Suisse); Bernard Blanc, Chemin de Champagne 18, 1025 Saint-Sulpice (Suisse) et faire parvenir une copie de votre correspondance initiale à la Division commerciale, Ambassade du Canada, Kirchenfeldstrasse 88, 3005 Berne (Suisse).

Mezzanine Support Beam for Multi-Story Hook-in Type Shelving/314

Système d'étagères superposées à crochets de montage et poutre porteuse en mezzanine/314

A z-shaped beam for hook-in type shelving systems that can support mezzanine floors and walkways either with its top flange or its bottom flange, and in the latter case can act at the same time as kickplate and/or shelf-support while supporting the edge of the floor structure, thus allowing a series of these z-beams to completely support a floor structure by forming two sets of perpendicular beams, the distance between these beams being no more than the distance between posts. **PATENT 1,116,560.** Write: Peter G. Hammerschlag, 220 - 111th Avenue, S.E., Bellevue, Washington 98004 and send a copy of your initial correspondence to Canadian Consulate General, 412 Plaza 600, Sixth and Stewart, Seattle, Washington 98101-1286, U.S.A.

Winch System for Controlling Closing and Lifting of a Grab/314

Système sur treuil pour la commande de la fermeture et de levage d'un grappin/314

A winch arrangement for a crane having a grab, closing rope, and a holding rope, said arrangement having a holding and a closing drum to receive a portion of and apply a force to the closing and holding ropes, a holding and a closing hydraulic motor each of which is coupled to the respective holding or closing drum so as to drive same, and a hydraulic circuit to control the motors to apply a lifting force to both the holding and closing ropes via said holding and closing drums. **PATENT 1,116,589.** Write: Aquila Steel Company Limited, Moorebank Avenue, Moorebank, New South Wales 2170, Australia and send a copy of your initial correspondence to Canadian Consulate General, A.M.P. Centre, 8th Floor, 50 Bridge Street, Sydney, N.W.S. 2000, Australia.

Optical Sensing Apparatus and Method/314

Appareil et méthode de détection optique/314

A sensor for measuring stress, temperature, pressure, sound, etc. comprising an optical waveguide, preferably an optical fiber waveguide, a light source which injects light into one end of the waveguide, a deformer contacting and deforming the waveguide to cause light to couple from originally excited modes to other modes, and an optical detector to detect the change in light coupling caused by deformation of the waveguide. **PATENT 1,116,884.** Write: Pedro B. Macedo, 6100 Highboro Drive, Bethesda, Maryland 20034; Theodore A. Litovitz, 904 Devere Drive, Silver Spring, Maryland 20903 and send a copy of your initial correspondence to Canadian Consulate General, 3 Parkway Building, Suite 1310, Philadelphia, Pennsylvania 19102, U.S.A.

Wind Energy Converter/314

Éolienne/314

A wind energy converter capable of transforming the kinetic energy of the wind into mechanical energy and eventually into electrical energy. The converter has a number of sails which capture the wind. The sail is mounted on moving platforms which are provided with several sets of rollers enabling it to travel in a close-loop guide rails allowing the sails to go round and round. The sails are further attached to a pair of chains engaging a lower and upper sprockets. The lower sprockets, through an extended supporting shaft, transmit the mechanical energy of the converter to an electric generator. **PATENT 1,117,022.** Write: Diosdado L. Cocjin, 33 Tealham Drive, Unit 54, Rexdale, Ontario M9V 3T5 and send a copy of your initial correspondence to the Licensing Opportunities Section (34/3), Business Centre, Department of Industry, Trade and Commerce, Ottawa, Ontario K1A 0H5.

Economic Solar Energy Concentration and Collection/314

Concentration et captage économiques de l'énergie solaire/314

Apparatus and methods for concentrating and collecting solar energy are disclosed. In accordance with the invention, solar energy is concentrated by economical refringent lenses or lens systems including fluid lenses and/or Fresnel-type lenses. The lenses concentrate the solar energy preferably along lines in continuous linear foci or in discrete foci at an elongated collector comprising one or more fluid-carrying conduits and one or more fluids therein. In one embodiment, a plurality of photoelectric cells are located in or on the collector along the linear foci or at the discrete foci and operate at increased efficiency with heat being removed by the collector. A first fluid in the collector is heated by the concentrated solar energy and in a preferred embodiment is used to heat a second fluid contiguous to the first fluid, the first fluid having a boiling point exceeding that of the second fluid. In a preferred embodiment, the first fluid is carried in an inner conduit while the

second fluid is carried by an outer conduit which encloses the inner conduit and first fluid. Thus, the two fluids can be heated to different temperatures by a single concentrating system and used for different purposes. Additionally, the invention provides for the storage of energy using two fluids of different boiling points. Also disclosed are methods and fixed and portable apparatus for distilling water containing salt or other substances by evaporation of the water and condensation of the water vapor wherein preferably the heat of condensation is recovered. The invention also provides for assemblies of individual systems to form larger systems. The present invention provides heat from solar energy at a cost competitive with heat produced from fuels. **PATENT 1,117,070.** Write: Virgil Stark, 936 Fifth Avenue, New York, N.Y. 10021 and send a copy of your initial correspondence to Canadian Consulate General, 1251 Avenue of the Americas, New York City, N.Y. 10020-1175, U.S.A.

United States Government Patent Applications Available For U.S. and Possibly Foreign Licensing

Paper or microfiche copies of the following U.S. patent applications may be purchased from NTIS for $6.00 (PC) and $4.00 (MF) unless otherwise indicated, using Visa, Master Charge, American Express, NTIS deposit accounts, cheque or money order in U.S. funds. Requests to license any corresponding Canadian patent rights should be addressed to the U.S. departments indicated with a copy of your initial correspondence forwarded to the Canadian Consulate General, 3 Parkway Building, Suite 1310, Philadelphia, Pennsylvania 19102.

NTIS
Mr. George Kudravetz
Product Manager
U.S. Department of Commerce
National Technical Information Services
5285 Port Royal Road
Springfield, Virginia 22161

Navy
U.S. Department of the Navy
Assistant Chief for Patents
The Office of Naval Research
Mailing Code: 302
Arlington, Virginia 22217

Demandes de brevet adressées au gouvernement des États-Unis, pour l'obtention de licences américaines et étrangères éventuellement disponibles

Des copies sur papier ou microfiche des demandes de brevet américain suivantes sont vendues par le NTIS au coût de $6.00 (copie sur papier) et de $4.00 (copie sur microfiche) à moins d'indication contraire. Les cartes de crédit Visa, Master Charge, American Express sont acceptées ainsi que les comptes de dépôts NTIS, chèques et mandats en argent américain. Il faut adresser toute demande de renseignements dans le but d'obtenir des licences portant sur les droits de brevet canadien correspondants aux ministères des É.-U. indiqués et adresser une copie de votre correspondance initiale au Consulat général du Canada, 3 Parkway Building, Suite 1310, Philadelphie (Pennsylvanie) 19102.

NASA
Negotiating centers for NASA patent applications and the Canadian trade offices concerned are listed with the item.

Les centres de négociation pour les demandes de brevet de la NASA et les bureaux commerciaux du gouvernement canadien concernés sont indiqués avec l'article.

Exhaust Nozzle Actuation Assembly/314

Dispositif de commande de la tuyère d'échappement/314

Filed May 30, 1980, by the Department of the Air Force. An actuation assembly for selectively varying the throat area of a convergent-divergent exhaust nozzle of a gas turbine engine and simultaneously achieving predetermined fixed ratios of throat area versus exit area is disclosed. The assembly structurally comprises a plurality of constituent components (including a linear actuator member on the port side, and another on the starboard side, of the nozzle in parallel spaced-apart relationship with the centerline common to the engine and to the exhaust nozzle) that interact and cooperate to pivot the convergent flaps to reduce the throat area while simultaneously moving the divergent flaps inwardly, or to pivot the convergent flaps to increase the throat area while simultaneously moving the divergent flaps outwardly, as desired, thereby permitting the selective varying of the throat area while attaining a predetermined fixed ratio of the throat area to the exit area of the convergent-divergent exhaust nozzle. Only a single actuator per side is required. Write: **PAT-APPL-6-154 720**, NTIS.

Thermal Tear Measuring Apparatus for Elastomers/314

Appareil de mesure de la résistance à la déchirure des élastomères en fonction de la température/314

Filed December 30, 1980, by the Department of the Air Force. This invention relates to an apparatus for measuring the tear strength of an elastomer specimen having a housing which contains therein a specimen holder, a controllable heat source, a force applying assembly which includes a taut wire, means for measuring the amount of movement of the force applying assembly and a temperature programmer and strip chart recorder. The force applying assembly by means of the taut wire

applies a predetermined amount of force on the elastomer specimen which has been precut on one side thereof. The load on the taut wire is counterbalanced by a calibrated spring such that the load decreases linearly to zero as the tearing of the specimen is completed. The result of the tearing is displayed and shows the transition of the elastomer from glass to rubber, the modulus before tearing, the progression of tearing versus increasing temperature, and the strength of the elastomer at elevated temperatures. Write: **PAT-APPL-6-221 185**, NTIS.

Low Frequency Pulse Generator Apparatus/314

Appareil générateur d'impulsions à basse fréquence/314

Filed January 22, 1981, by the Department of the Air Force. The present invention utilizes one of a plurality of variable capacitors which may be switched into an R-C timing network to establish the pulse repetition rate of the pulse generating circuit. The output of the pulse generator unit is amplified and applied to a predetermined counter unit wherein, upon accumulation of the desired count, an interrupt signal is generated. The interrupt signal which is applied to the pulse generator unit disables the pulse output and thereby allows the generation of a predetermined number of pulses. It is one object of the present invention, therefore, to provide an improved low frequency pulse generator apparatus. It is another object of the invention to provide an improved low frequency pulse generator apparatus wherein the pulse sequence is terminated upon reaching a predetermined pulse count. It is another object of the invention to provide an improved low frequency pulse generator apparatus to provide preset total number of output pulses at a selected pulse rate. It is yet another object of the invention to provide an improved low frequency pulse generator apparatus wherein the preselected pulse counting sequence will resume uninterrupted after an interruption in the counting sequence. Write: **PAT-APPL-6-227 557**, NTIS.

Pulsed Radiation Dosimetry Apparatus/314

Dosimètre de rayonnements pulsés/314

Filed January 22, 1981, by the Department of the Air Force. This invention relates to a pulsed radiation dosimetry apparatus utilizing a pin diode to detect pulsed radiation that may be produced by either a particle accelerator or a flash x-ray device. The detected radiation signal is integrated and then directly displayed on a digital meter. The present apparatus provides a direct readout of radiation dose in rads. Write: **PAT-APPL-6-227 558**, NTIS.

Holographic Coupler for Fiber Optic Systems/314

Coupleur holographique pour systèmes à fibre optique/314

Filed February 3, 1981, by the Department of the Air Force. A holographic coupler for fiber optic systems has a holographic element utilized in conjunction with an optical source and an optical fiber in order to direct and couple the beam emanating from the optical source into the fiber. The holographic element, source and optical fiber have the same relative position with respect to each other as (1) a photosensitive medium, (2) a means for sizing and shaping a beam of temporally and spatially coherent radiation to the same geometry as the optical source before the beam impinges upon the photosensitive medium, and (3) the focal point of a converging beam of temporally and spatially coherent radiation impinging upon the photosensitive medium during the making of the holographic element used with the coupler. Write: **PAT-APPL-6-231 088**, NTIS.

Method and Apparatus for Iodine Vaporization/314

Appareil et méthode de sublimation de l'iode/314

Filed May 10, 1981, by the Department of the Air Force. Iodine vapor is supplied to an oxygen iodine laser by an improved iodine vaporizer. The vaporizer has a radiation transparent window and iodine crystals are contained in the vaporizer. Broad beam radiation from a variable intensity source is directed through the window into the vaporizer where it is absorbed by the iodine crystals, causing the iodine crystals to sublime. The iodine vapor is transported to the laser by a carrier gas flowed through the vaporizer. Coarse control of the iodine flow is achieved by controlling the carrier gas flow. Control of the amount of iodine vapor introduced into the carrier gas flow is achieved by varying the amount of radiation directed into the vaporizer. Write: **PAT-APPL-6-242 505**, NTIS.

Switching Method for Effecting Replication in Magnetic Bubble Devices/314

Méthode de commutation pour effectuer la reproduction des répliques dans les dispositifs à bulles magnétiques/314

Filed April 13, 1981, by the Department of the Air Force. Replication in a magnetic bubble device is realized by a method of operation that is based on the principle of stretching, then cutting the bubble by the control current pulses. In this mode of operation, the bubble is stretched, under the influence of a large amplitude current pulse in the control conductor, between the switch propagate element in the primary track and another propagate element in the secondary track. The bubble strip is let to propagate for a fraction of a field cycle after which a second large amplitude narrow pulse is applied to the control conductor to sever the bubble strip into two parts. One part propagates as would the original bubble in the primary track and the second part propagates in the secondary track. Write: **PAT-APPL-6-253 454**, NTIS.

Pulse Width Modulated Power Amplifier with Differential Connecting Line Voltage Drop Comparators/314

Amplificateur de puissance à modulation d'impulsions en durée avec comparateurs différentiels des chutes de tensions dans les lignes de raccordement/314

Filed April 22, 1981, by the Department of the Air Force. The adverse effects of the impedance of long varying impedance connecting lines used in pulse width modulated power amplifier are eliminated by means of a dual input differential amplifier that senses the line voltage drops in the connecting lines and combines them into a line voltage drop compensation signal that is applied across the power amplifier inputs. This line voltage drop compensation signal raises the output of the power amplifier by the amounts needed to null out the line voltage drops. Write: **PAT-APPL-6-256 373**, NTIS.

Spacer Structure/314

Espaceur/314

Filed April 24, 1981, by the Department of the Air Force. The invention is a unique structure that is generally useable as a spacer, and that in a particular application is useable as spacer between adjacent stator vanes on a fan stator of a multiple-stage fan of a gas turbofan engine. Accordingly, the principal object of this invention is to provide the above said spacer by way of teaching the structure of a preferred embodiment thereof. This principal object, as well as other related objects (such as simplicity, low cost, and reliability), of this invention will become readily apparent after a consideration of the description of the invention, together with reference to the contents of the Figures of the drawing. Write: **PAT-APPL-6-256 880**, NTIS.

Phase Shifter Adjustment Apparatus/314

Appareil de réglage de déphaseur/314

Filed April 24, 1981, by the Department of the Air Force. This invention concerns a phase shifter adjustment apparatus utilizing a current source bleed unit to control microwave ferrite phase shifter coils without elongating the switching time. The current sources provide a high impedance to the phase shifter coils thereby minimizing RL time constants. Write: **PAT-APPL-6-256 881**, NTIS.

Integrated Optical Fiber Waveguide Connector/ Package Assembly/314

Ensemble intégré de connexion d'un guide d'onde à fibres optiques/314

Filed April 28, 1981, by the Department of the Air Force. This invention relates to an integrated connector/package assembly for single-stranded optical fiber waveguides. The integrated assembly comprises: a coupler subassembly in which a plurality of coupled, single-strand, optical fiber waveguides are suspended and encased in a container, with the uncoupled end of each optical fiber waveguide bonded in a different port of the container, and with each port defined by a V-shaped groove in the body member of the container and by the lid member attached to the body member; and, a plurality of connector elements having one end of each of a plurality of external, single-strand, optical fiber waveguides bonded thereto, with the connector elements releasably connected to the body member of the container, and with the bonded ends of the external optical fiber waveguides in abutting light-transmissive contact with the bonded ends of the coupled optical fiber waveguides. The integrated connector/package assembly in useable in an environment, such as in an aircraft, in which there is shock, vibration, changes in altitude and resultant changes in temperature, and fatigue due to long term exposure to high humidity while under stress. Write: **PAT-APPL-6-258 339**, NTIS.

Magnetic Two-Phase Thermosiphon/314

Thermosiphon magnétique à deux phases/314

Filed April 28, 1981, by the Department of the Air Force. This invention relates generally to thermosiphon or heat pipe devices for removing from a heat generating system or reservoir large quantities of heat by vaporization of a liquid at one end of the device and condensation of the vapor so produced at another end. More specifically, this invention relates to an improved thermosiphon or heat pipe device utilizing a diamagnetic or paramagnetic fluid which may be circulated through the device by the imposition of a magnetic field graphite. Write: **PAT-APPL-6-258 341**, NTIS.

Elastomeric Seal/314

Joint élastomérique/314

Filed April 30, 1981, by the Department of the Air Force. An elastomeric bore seal, and a method of making and installing it. The seal is a fluid-impervious, thin-walled (.625 mm), open-ended, cyclinder-like member which is made of an expansible material that can withstand a wide range of temperatures (-55°C to 205°C) and that is inflatable to conform to the configuration of that to which it is to be bonded and thereby installed. The use of the seal as a bore seal in an electrical machine not only provides an economical, reliable, leak-proof way of excluding stator cooling fluid from the rotor cavity, but also permits a significant reduction (26%) in the weight of the electrical machine and a correspondingly substantial reduction in the size of the machine itself. Write: **PAT-APPL-6-259 761**, NTIS.

Two Carrier Dual Injector Apparatus/314 **Appareil d'injection double à deux porteurs/314**

Filed May 6, 1981, by the Department of the Air Force. This invention relates to a two carrier dual injector semiconductor apparatus utilizing a pair of injector gates for simultaneously injecting holes and electrons into a series stack of insulator layers. The stacked insulator layers which may be arranged in a MIM or MIS configuration have injecting layers near opposing metal gates for injecting either electrons as holes into the insulator layers depending upon the polarity of the applied bias voltage. The apparatus is capable of high current low voltage carrier injection while maintaining a stable trapped spaced charge within the stack of insulator layers. Write: **PAT-APPL-6-260 878**, NTIS.

Combined Radar/Barometric Altimeter/314 **Altimètre combiné radar/barométrique/314**

Filed May 6, 1981, by the Department of the Air Force. This invention relates an altitude sensing arrangement which combines the advantages of a barometric altimeter with a radar altimeter. The apparatus monitors the radar altimeter's associated radar validity signal and selects the radar altimeter's reading when the validity signal indicates a valid condition. Alternately, when the validity signal does not indicate a valid condition, the invention computes the difference in barometric altitude since the last valid radar altimeter reading and sums this difference with the last valid reading from the radar altimeter to produce a combined altitude reading. Write: **PAT-APPL-6-260 879**, NTIS.

Production of Negative Ions of Hydrogen Isotopes/314 **Production d'ions négatifs d'isotopes de l'hydrogène/314**

Filed May 14, 1981, by the Department of the Air Force. A process for generating negative ions of hydrogen isotopes is described which comprises cooling the hydrogen gas below 300K, and preferably to about 200K, vibrationally exciting the molecules of the gas, and then dissociating the molecules by electron impact into neutral hydrogen atoms and negative hydrogen ions. Alternatively, the gas may first be vibrationally excited by heating or the like, and then cooled translationally, for example, by rapid expansion prior to dissociation by electron impact. The processes of this invention are characterized by control of non-equilibrium conditions to obtain large increases in dissociative attachment rates by increasing the population of hydrogen gas molecules having a higher vibrational energy state. Write: **PAT-APPL-6-263 629**, NTIS.

Polyaromatic Ether-Keto-Sulfones Curable by Diels-Alder Cycloaddition/314 **Éther-céto-sulfones polyaromatiques à durcissement par cyclo-addition de Diels-Alder/314**

Filed May 20, 1981, by the Department of the Air Force. The acid chloride of bis-m-carboxyphenyl acetylene was copolymerized with a mixture of isophthaloyl chloride, diphenyl ether and a 4,4'-diphenoxydiphenyl sulfone to produce novel polyaromatic ether-keto-sulfones easily cured by a Diels-Alder cycloaddition reaction. Write: **PAT-APPL-6-265 521**, NTIS.

Polyaromatic Amides Containing 1,3-Butadiene Units/314 **Amides polyaromatiques contenant des maillons 1,3-butadiène/314**

Filed May 20, 1981, by the Department of the Air Force. The present invention concerns itself with the synthesis of novel polyaromatic amides containing 1,3-butadiene groups. These polyamides have been found to be especially useful as laminating resins for a variety of laminating applications. The synthesis is effected through a condensation polymerization of acid choloride of 1,4-bis-p-carboxyphenyl-1,3-butadiene and an aromatic diamine. The resulting product is insoluble in all solvents. Write: **PAT-APPL-6-265 719**, NTIS.

Polyaromatic Amides Curable by Diels-Alder Cycloaddition/314 **Vulcanisation de polyamides aromatiques par cycloaddition de Diels-Alder/314**

Filed May 29, 1981, by the Department of the Air Force. New processable polyaromatic amides were prepared from the acid chloride of bis-m-carboxyphenyl acetylene and several aromatic diamines. The polyamides containing the acetylene units were cured by Diels-Alder cycloaddition reaction with 1,4-diphenyl-1,3-butadiene. Cured polyamides showed increase in Tg. thermal and heat stabilities. The polyamides can be cast into films and give good glass fiber laminates. Write: **PAT-APPL-6-265 720**, NTIS.

Polyaromatic Ether-Ketone-Sulfones Containing 1,3-Butadiene Units/314 **Poly (éther-cétone-sulfones aromatiques) contenant des molécules de 1,3-butadiène/314**

Filed May 20, 1981, by the Department of the Air Force. The present invention concerns itself with novel 1,3-butadiene containing polymeric materials which have been found to be especially useful as laminating resins. The polymers of this

invention are polyaromatic ether-ketone-sulfones. They are synthesized by effecting a Friedel-Crafts type polymerization reaction from a mixture of the acid chloride of 1,4-bis-p-carboxyphenyl-1,3-butadiene; 4,4'-diphenoxy-diphenyl sulfone; isothaloyl chloride; and diphenyl ether. Accordingly, the primary object of this invention is to provide novel polyaromatic ether-ketone-sulfones containing 1,3-butadiene units on the polymeric chain. Another object of this invention is to provide a curable polymeric material that does not develop gaseous side products when subjected to cross-linking or curing procedures. Still another object of this invention is to provide a polymeric material particularly adapted for use as a laminating resin and characterized by good solubility before curing coupled with a high degree of thermal stability and strength after curing. Write: **PAT-APPL-6-265 721**, NTIS.

Current Transformer High Voltage Probe Utilizing Copper Sulfate Water Resistor/314

Sonde haute tension à transformateur de courant utilisant une résistance à solution aqueuse de sulfate de cuivre/314

Filed May 21, 1981, by the Department of the Air Force. A current transformer and copper sulfate water resistor are combined to provide a probe capable of measuring very fast, high voltage pulses. The resistor is connected in series with the primary winding of the current transformer and consists of an elongated plastic tube filled with an aqueous solution of copper sulfate. The series arrangement of resistor and current transformer primary winding is applied across the source of voltage to be measured and the current transformer secondary winding output is a function of the measured voltage. The current transformer secondary output is applied to and displayed on an oscilloscope. Write: **PAT-APPL-6-265 865**, NTIS.

An Adjustable Holder for an Optical Element on the Like/314

Support réglable pour un élément optique/314

Filed May 28, 1981, by the Department of the Air Force. An adjustable holder has a base, a cover and a sphere-like element for supporting a prism or other optical element within a central cavity formed in the base. The base and cover have interior spherical surface portions which are engaged by exterior spherical surface portions on the prism-supporting element so as to allow universal movement of the prism relative to the base for readjusting the angular position of the prism relative thereto in roll, pitch and yaw simultaneously. The cover may be tightened onto the base for clamping the sphere-like element there between and holding the prism in the desired adjusted position. Write: **PAT-APPL-6-267 938**, NTIS.

Oxide Passivated Mesa Epitaxial Diodes with Integral Plated Heat Sink/314

Diodes épitaxiales mesa à passivation par oxyde comportant un dissipateur de chaleur intégral plaqué/314

Filed June 3, 1981, by the Department of the Air Force. This invention relates to an oxide passivated mesa epitaxial diode with an integral heat sink, and a process by which it may be fabricated. The passivation layer of highly pure thermally grown SiO_2 is formed over the mesa walls in the region of the pn junction without causing a reaction between the contact metals and their surroundings during the high temperature environment imposed during thermal growth. The heat sink is deposited after the SiO_2 passivation has been grown, replacing a polycrystalline silicon layer beneath the mesa formation which was used as a temporary structural support. Dopant, to form the pn junction is introduced into the silicon wafer after the formation of the passivation layer but before the heat sink is deposited. Write: **PAT-APPL-6-270 050**, NTIS.

Method of Enhancing Rotor Bore Cyclic Life/314

Méthode pour prolonger la durée de service d'un alésage de rotor/314

Filed June 3, 1981, by the Department of the Air Force. This invention relates to a method of enhancing or prolonging the low cycle fatigue life of the bore area of a rotating disk. The method comprises the step of prestressing the bore area by heating the web/rim area of the disk, while moderately overspeeding the disk. The heating can be accomplished with the use of induction heating coils which are disposed adjacent the web/rim area of the disk. This method, unlike prior art prestressing methods, is simple to perform, is cost effective, and does not compromise the disk or the design of the assembly of which the disk is a component. Write: **PAT-APPL-6-270 051**, NTIS.

Linear Motor Controller/314

Commande de moteur linéaire/314

Filed March 16, 1981, by the Department of the Army. The controller interfaces up to two linear motors to either a manual control panel or a two channel computer. The control commands can emanate from either the computer (for both motors) or a combination of the computer (for one motor) and the linear motor (solenoid) with a lateral throw of one inch. In one mode, the controller will slew the armature back and forth at a uniform rate. In another mode, the controller will slew the armature at a commanded rate and then automatically modify the rate so that the armature will comply with periodic position commands from the computer. In a further mode, the controller will retract the armature to an initial position, clear the

counters, and reset all logic. At all times, the position of either motors' armature can be read visually from the control panel and both motors' armature positions can be read from the respective computer channels. Write: **PAT-APPL-6-244 438**, NTIS.

Laser Beam Pointing Aid/314

Dispositif de pointage d'un faisceau laser/314

Filed March 27, 1981, by the Department of the Army. A laser beam pointing aid is described for field testing of breadboard laser systems and utilizing a hollow housing with apertures at each end and with crosshairs at one end of the housing and a telescope adjustably mounted to the hollow housing and being positionable relative to an output beam from a laser system to allow one to utilize the last mirror of the laser system and the laser beam pointing aid to accurately point the laser beam to a target. Write: **PAT-APPL-6-248 376**, NTIS.

Compressed, Dehydrated and Flaked Meat Bar/314

Tablette de viande en particules déshydratées et agglomérées/314

Filed April 1, 1981, by the Department of the Army. A method is disclosed for making a dehydrated, compressed food bar consisting essentially of meat or meat and vegetables, wherein the meat is subdivided by flaking and then formed into a solid mass which is cooked to inactivate enzymes. The meat mass is then frozen, diced, and dehydrated. The diced material is then compacted, dehydrated and packaged in a package which will maintain the low moisture condition. Write: **PAT-APPL-6-249 594**, NTIS.

Virtual Space Teleconference System/314

Système de téléconférence à espace virtuel/314

Price per copy from NTIS: PC U.S. $7.50/MF U.S. $4.00, filed June 8, 1981, by the Department of the Army. A teleconference system for N conferees, N being greater than two, includes at least two separate stations. Each station has N conferee positions, confronting a virtual conference space, and corresponding conferee positions at each station have the same relative locations about the virtual conference space. At least one conferee position at each station is adapted to be occupied by a conferee in person. Surrogate conferees, which include a video display, a video camera, and a loudspeaker, occupy each conferee position not adapted to be occupied by a conferee in person. Each video display faces one conferee and displays the image of another conferee at a corresponding position at another station; the loudspeaker reproduces the voice of the other conferee. The video camera forms image signals of the one conferee and couples these signals to the display device of a surrogate conferee at a conferee position corresponding to the position of the one at the other station. The system includes a shared graphic display system. Write: **PAT-APPL-6-271 062**, NTIS.

Apparatus and Method for Precise Determination of Crystallographic Orientation in Crystalline Substances/314

Appareil et méthode de mesure précise des axes cristallographiques de substances cristallines/314

Filed August 3, 1981, by the Department of the Army. This document describes an apparatus and method for precisely measuring the angles of cut of single and doubly rotated cuts of quartz crystal blanks on a high volume production basis. Write: **PAT-APPL-6-289 353**, NTIS.

Low Distortion Oscillator/314

Oscillateur à faible distorsion/314

Filed August 5, 1981, by the Department of the Army. An FET oscillator, including the means for controlling the gain of the oscillator to control its output level to thereby avoid limiting, and thus to reduce distortion of the oscillator output. Write: **PAT-APPL-6-290 264**, NTIS.

Alkaline Battery Containing a Separator of a Cross-Linked Copolymer of Vinyl Alcohol and Unsaturated Carboxylic Acid/314

Pile alcaline à élément séparateur fait d'un copolymère réticulé constitué d'alcool vinylique et d'un acide carboxylique insaturé/314

Filed July 10, 1981, by NASA. A battery separator for an alkaline battery separator comprises a crosslinked copolymer of vinyl alcohol units and unsaturated carboxylic acid units. The crosslinked copolymer is insoluble in water, has excellent zincate diffusion and oxygen gas barrier properties and a low electrical resistivity. A polyaldehyde crosslinking agent is preferred. Write: **PAT-APPL-6-282 298**, NASA, Lewis Research Center, 21000 Brookpark Road, Cleveland, Ohio 44135 and send a copy of your initial correspondence to Canadian Consulate General, Illuminating Building, 55 Public Square, Cleveland, Ohio 44113-1983, U.S.A.

Automatic Level Control Circuit/314 **Circuit de commande automatique de niveau/314**

Filed July 17, 1981, by NASA. An automatic level control circuit for an operational amplifier is disclosed for minimizing spikes or instantaneous gain of the amplifier at a low period wherein no signal is received on the input. The apparatus includes a multi-branch circuit which is connected between an output terminal and a feedback terminal. A pair of zener diodes are connected back-to-back in series with a capacitor provided in one of the branches. A pair of voltage dividing resistors are connected in another of the branches and a second capacitor is provided in the remaining branch of controlling the high frequency oscillations of the operational amplifier. Write: **PAT-APPL-6-284 288**, NASA, John F. Kennedy Space Center, Mail Code: SA-PAT, Cocoa Beach, Florida 32899 and send a copy of your initial correspondence to Canadian Consulate General, 900 Coastal States Building, 260 Peachtree Street, Atlanta, Georgia 30303-1290, U.S.A.

Method of Repairing Surface Damage to Porous Refractory Substrates/314 **Réparation des dommages superficiels des couches inférieures réfractaires d'échappement/314**

Filed May 22, 1981, by NASA. Damage to a porous refractory material coated with a glass coating such as the tiles on the space shuttle orbiter is repaired by (1) applying hydrolyzed tetraethyl orthosilicate to the damaged area; (2) curing the tetraethyl orthosilicate; (3) applying to damaged area a pliable filler comprised of hydrolyzed tetraethyl orthosilicate and powered refractory substrate; and (4) heating the damaged area to cure filler. Write: **PAT-APPL-6-266 254**, NASA, Lyndon B. Johnson Space Center, Mail Code: AM, Houston, Texas 77058 and send a copy of your initial correspondence to Canadian Consulate General, 2001 Bryan Tower, Suite 1600, Dallas, Texas 75201-3051, U.S.A.

Electrophoresis Device/314 **Dispositif électrophorétique/314**

Filed April 16, 1981, by NASA. Process efficiency is enhanced through the use of copper walls of high thermal conductivity and jackets for cooling the walls and controlling the thermal gradients in the separation chamber of an electrophoresis device which also includes a distribution chamber and a collection chamber. The distribution chamber has an inlet through which a buffer solution may enter and a series of conditioner tubes which straighten the buffer flow before it enters the separation chamber. Electrode assemblies, adjacent to the separation chamber, include electrode chambers having a dialysis membrane portion through which an electrical field is impressed across the separation chamber. Passages separate the electrode and separation chambers so that flow variations and membrane variations around the slotted portion of the electrode chamber do not induce flow perturbations into the laminar buffer certain flowing in the separation chamber. A sample of the substance to be separated is inserted into a hollow tube that extends through the conditioner tubes and inserts the sample in the buffer flow after it is straightened and stabilized in the separation chamber. Write: **PAT-APPL-6-254 575**, NASA, Marshall Space Flight Center, Mail Code: CC01, Huntsville, Alabama 35812 and send a copy of your initial correspondence to Canadian Consulate General, 900 Coastal States Building, 260 Peachtree Street, Atlanta, Georgia 30303-1290, U.S.A.

Waveguide Cooling System/314 **Système de refroidissement de guide d'ondes/314**

Filed April 30, 1981, by NASA. An improved system is described for cooling high power waveguides by the use of cooling ducts extending along the waveguide, which minimizes hot spots at the flanges where waveguide sections are connected together. The cooling duct extends along substantially the full length of the waveguide section, and each flange at the end of the section has a through hole with an inner end connected to the duct and an opposite end that can be aligned with a flange hole on another waveguide section. Each flange is formed with a drainage groove in its face, between the through hole and the waveguide conduit to prevent leakage of cooling fluid into the waveguide. The ducts have narrowed sections immediately adjacent to the flanges to provide room for the installation of fasteners closely around the waveguide channel. Write: **PAT-APPL-6-259 210**, Monte F. Mott, Patent Counsel, NASA Resident Legal Office, Mail Code: 180-601, 4800 Oak Grove Drive, Pasadena, California 91103 and send a copy of your initial correspondence to Canadian Consulate General, 510 West Sixth Street, Los Angeles, California 90014-1377, U.S.A.

Asymmetric Polyimide Separation Membrane and Method/314 **Membrane asymétrique de séparation des polyimides et méthode d'utilisation/314**

Filed April 30, 1981, by NASA. The production of an asymmetric separation membrane by solution casting phase inversion of an aromatic fully imidized polyimide is described. The imide is made from polycondensation of an aromatic tetracarboxylic acid and a mixture of aromatic diisocyanates. The imide is soluble in conventional isocyanate solvents. The membrane has particular application to ultrafiltration and other separation processes at elevated temperatures. This approach is also suitable for production of ultrafilters from other soluble polyimides such as those made from various combinations of aromatic tetracarboxylic dianhydrides and aromatic diamines. Write: **PAT-APPL-6-259 213**, Monte F. Mott, Patent Counsel, NASA Resident Legal Office, Mail Code: 180-601, 4800 Oak Grove Drive, Pasadena, California 91103 and send a copy of your initial correspondence to Canadian Consulate General, 510 West Sixth Street, Los Angeles, California 90014-1377, U.S.A.

Enhancement of in Vitro Guayule Propagation/314

Amélioration de la propagation in vitro de la guayule/314

Filed June 30, 1981, by NASA. The in vitro propagation of Guayule from a nutrient media containing Guayule tissue is stimulated by adding a substituted trialkyl amine bioinducing agent to the nutrient media. Selective or differential propagation of shoots or callus is obtained by varying the amounts of substituted trialkyl amine present in the nutrient media. The luxuriant growth provided may be processed for its poly isoprene content or may be transferred to a rooting media for production of whole plants as identical clones of the original tissue. Large numbers of Guayule plants having identical desirable properties such as high polyisoprene levels can be produced. Write: **PAT-APPL-6-280 153**, Monte F. Mott, Patent Counsel, NASA Resident Legal Office, Mail Code: 180-601, 4800 Oak Grove Drive, Pasadena, California 91103 and send a copy of your initial correspondence to Canadian Consulate General, 510 West Sixth Street, Los Angeles, California 90014-1377, U.S.A.

Gold Based Electrical Contact Materials, and Method Therefor/314

Matériaux à base d'or pour contacts électriques et méthode de fabrication/314

Filed April 17, 1981, by the Department of the Navy. There is presented gold based contact materials fabricated by internal carburization and method therefor. Carburizable refractory elements are carburized by internal carburization by exposing a gold based solid solution containing the refractory element to an atmosphere of a gaseous oxide of carbon at an elevated temperature. The elevated temperature is chosen to be below the melting point of the solid solution and high enough to cause gaseous decomposition of a carbon material packed with the solid solution within an enclosing container. The carburizable refractory element with the solid solution is preferentially carburized by the gaseous oxide of carbon to form hard, refractory second phase carbide particles with the gold matrix. Write: **PAT-APPL-6-255 081**, NAVY.

Gold Based Material for Electrical Contact Materials/314

Matériau à base d'or pour matériaux de contacts électriques/314

Filed April 27, 1981, by the Department of the Navy. There is presented an electrical contact material consisting of an alloy of gold and a compound selected from a group consisting of a carbide, a boride, or a silicide of a refractory element. The compound of the refractory element is selected from a group consisting of WC, Hfb2, TiB2, ZrB2, WSi2, and TiSi2. The resulting alloys have a hexogonal crystal structure and exhibit high wear resistance, low contact resistance, low electrical noise, and a homogeneous uncontaminated microstructure. Write: **PAT-APPL-6-258 134**, NAVY.

Gold Based Compounds for Electrical Contact Materials/314

Composés à base d'or pour matériaux de contacts électriques/314

Filed April 27, 1981, by the Department of the Navy. Gold-based intermetallic compounds suitable as a contact material for electrical contacts are presented. The gold-based electrical compounds are selected from a group consisting of Au4In, Au10Sn, and AuPd or from intermetallic compounds having an ordered hexagonal crystal structure and of the type AunX where n is at least 3. Write: **PAT-APPL-6-258 157**, NAVY.

Gold Based Electrical Materials/314

Matériaux électriques à base d'or/314

Filed April 29, 1981, by the Department of the Navy. A gold based electrical contact material comprising an oxide of an oxidizable element in the gold matrix formed by subjecting the solid solution to an oxidizing atmosphere for internally oxidizing the oxidizable element is presented. Such internal oxidation forms hard second phase oxide particles dispersed throughout the solution having high wear resistance, high hardness, high strength and high conductivity with homogeneous and uncontaminated structure. Write: **PAT-APPL-6-258 829**, NAVY.

Laser Formed Video Tube Calibration Markers/314

Marqueuse à laser de tubes vidéo/314

Filed July 6, 1981, by the Department of the Navy. This document describes an apparatus for forming fiducial marks on an imaging surface of a video tube comprising a laser system that outputs an alignment focused beam and a pulsed focused beam upon command, a driven jig positioner that holds and moves the video tube, a controller programmed to move the jig in a predetermined manner so that fiducial marks are formed on the tube in a desired pattern, and video monitoring means for observing said focused beams on the imaging surface. Write: **PAT-APPL-6-280 767**, NAVY.

Optical Decoder/314

Décodeur optique/314

Filed July 9, 1981, by the Department of the Navy. This document describes an optical device, for modulating radiation from an extended object by means of a pattern encoded reticle, in which said radiation is converted by a single photo detector to an electrical signal which drives a light emitting diode from which the light train is re-modulated by the same reticle and then sensed by a charge transfer device to produce as a decode output the image of the extended object. This optical imaging device makes use of the Fellgett or multiplex advantage to produce high resolution, high sensitivity images. Write: **PAT-APPL-6-281 817**, NAVY.

Quadrant Avalanche Photodiode/314

Photodiode à avalanche à quadrants/314

Filed July 13, 1981, by the Department of the Navy. This document describes a quadrant avalanche photodiode with large surface areas is made using photolithographic planar technology. The use of proton bombardment creates semi-insulating material around the quadrants. Semiinsulating material prevents cross-talk between quadrants. The Schottky barrier quadrant detectors were fabricated using GaAs(1-x) SB(x) ternary alloys grown epitaxially on heavily doped GaAs substrates. Write: **PAT-APPL-6-282 783**, NAVY.

External Cavity Diode Laser Sensor/314

Capteur à laser à diode comportant une cavité externe/314

Filed July 22, 1981, by the Department of the Navy. This document describes a sensor for sensing conditions such as acoustic waves, temperature changes, acceleration current and magnetic fields. The sensor employs a diode laser having its cavity contained between end facets defined by partially reflective mirrors, supplemented by an external cavity formed between one of the end facets of the laser and a translatable external reflector. The reflector is position-responsive to a condition to be sensed. A change in the reflector's positions causes laser output light to be fed back through the mirror into the laser cavity with varying phase such that an increase or decrease in laser emission is created. A change of detector voltage or change in laser current provides an indication of environmental condition being sensed. Write: **PAT-APPL-6-286 099**, NAVY.

Licensing Opportunities Through Control Data Worldtech, Inc., U.S.

The following technologies are offered for manufacture under license in Canada. When requesting additional information, please quote the reference number. Write: Ms. Lila B. Bates, Manager — Services, Control Data Worldtech, Inc., 7600 France Avenue So., Edina, Minnesota 55435 — Telephone: (612) 893-4650 and send a copy of your initial correspondence to Canadian Consulate General, 15 South Fifth Street, Minneapolis, Minnesota 55402.

Ozone Purification of Water/314

American company offers licensing rights to a Canadian manufacturer to use technology covering a new process and plug-in apparatus using ozone to purify water in the home and for industrial and utility applications. The home and office counter-top units supplying hot or cold water also include a charcoal filter to remove particulates. The unit employs solid-state electronics to produce ozone instead of the high-tension transformers and coils of conventional ozone generators. It also uses titanium oxide electrodes which are far less susceptible to fracture than conventional glass tube electrodes. This design: requires only 4.5 kWh per .45 kg of ozone it produces; uses solid state electronics that allow easy service in the rare event of malfunction — a circuit board change takes only minutes; and, delivers an ozone concentration of 1.6 to 2 per cent by weight, depending on the dryness of the intake air. Ozonation prevents scale build-up and even removes previously accumulated scale. The exact scale-removal process is as yet unclear, but it seems to be that ozone oxidizes minute organisms which are the glue holding the scale particles in place. The other market is the industrial one. Possible application includes: purifying process water for indefinite re-use; cleaning up waste water for safe discharge in compliance with environmental protection regulations; more complete purification of municipal water supplies at no greater cost than chlorination; purifying water used in cooling towers, precluding the need for periodic blow-down and minimizing scale build-up and plumbing corrosion; swimming pool water treatment which puts an end to the need for chlorine with its eye irritation and dosage problems; sewage treatment; and, purifying water for icthyculture tanks. It has been used for water treatment for oyster and trout hatcheries and aquariums; iron and cyanide removal at mines; making bottled water; cooling towers; treating industrial wastewater; and, supplying clean water for beverage plants. Licensing requires a front-end payment plus a royalty for a stipulated number of years, with the specific amounts based on the nature and size of the licensee's operation. This client also offers to discuss equity in the company in exchange for working capital, with the equity attained through acquisition, joint venture, merger, etc. Outright sale of the company is also possible.

Possibilités d'acquisition de licences par l'intermédiaire de la Control Data Worldtech, Inc., É.-U.

Les techniques suivantes sont proposées pour la fabrication sous licence au Canada. Lors de la demande de renseignements supplémentaires, veuillez citer le numéro de référence. Écrire à: Ms. Lila B. Bates, Chef de service, Control Data Worldtech, Inc., 7600 France Avenue So., Edina, Minnesota 55435 — Téléphone: (612) 893-4650 et faire parvenir une copie de votre correspondance initiale au Consulat général du Canada, 15 South Fifth Street, Minneapolis, Minnesota 55402.

Purification de l'eau à l'ozone/314

Une compagnie américaine offre à un fabricant canadien les droits d'exploiter sous licence la technologie concernant un nouveau procédé de purification à l'ozone de l'eau d'usage domestique, ou industriel, ou public au moyen d'un appareil électrique. Les modèles de table, de maison et de bureau, distribuant de l'eau chaude ou de l'eau froide, contiennent aussi un filtre à charbon de bois pour éliminer les matières particulaires. L'appareil en question produit l'ozone grâce à un système électronique à semi-conducteurs, plutôt que par bobines et transformateurs à haute tension comme les générateurs conventionnels. De plus ses électrodes sont en oxyde de titane, donc beaucoup moins sensibles au bris que les électrodes de verre conventionnelles. Avantages: ne demande que 10 kWh par kg d'ozone produit; le fonctionnement électronique à semi-conducteurs facilite la réparation dans l'éventualité peu probable d'une défectuosité (le remplacement d'un circuit intégré ne prend que quelques minutes); et, fournit une concentration d'ozone de 1,6 à 2% en masse, selon le degré d'humidité de l'air admis. L'ozonisation prévient l'entartrage et élimine même celui qui pourrait déjà exister. Le processus exact d'élimination du tartre demeure encore obscur, mais il semble que l'ozone oxyde des organismes infimes qui forment la "colle" qui agglomère les particules. L'industrie constitue un autre marché et voici quelques applications qui y sont possibles: purification des eaux de traitement pour recyclage illimité; purification des eaux usées pour les rejeter de façon sûre, conformément aux réglementations de protection du milieu; purification plus complète des réserves municipales d'eau à un coût ne dépassant pas celui de la chloration; purification de l'eau utilisée dans les tours de refroidissement éliminant le besoin de vidange périodique et diminuant l'entartrage et la corrosion de la plomberie; traitement de l'eau des piscines, ce qui élimine le besoin de chlore et ses problèmes d'irritation des yeux et de dosage; traitement des boues d'égout; et, purification de l'eau servant dans les pisciculturés. On a déjà utilisé l'appareil pour le traitement de l'eau des élevages d'huîtres et de truites, ainsi que des aquariums; pour l'élimination du fer et du cyanure dans les mines; pour l'embouteillage d'eau; pour les tours de refroidissement; pour le traitement des eaux usées industrielles; et, pour l'approvisionnement en eau pure des usines de boissons. L'exploitation sous licence nécessite un paiement préalable, plus une redevance pour un nombre stipulé

d'années, dont la valeur sera fixée d'après la nature et la taille de l'exploitation du preneur de licence. La compagnie offre aussi des actions en échange de capitaux. Ces actions peuvent s'acquérir par achat, association, fusion, etc. La vente forfaitaire de la compagnie est aussi possible.

Parity Simulator for Modelling/314

American inventor offers a Canadian company the manufacturing and worldwide marketing rights to a flexible and highly interactive model which simulates the behaviour of high-power electrical systems employing electronic switching devices such as silicon-controlled rectifiers, transistors, and thyristors. There is a one-to-one correspondence, or "parity", between the topology of the system being modeled and that of the model, making the simulator very simple to use and allowing experiments in design without completely rebuilding the model. New users require approximately two hours to become familiar enough with the simulator to obtain useful results. The simulator consists of synthetic electrical elements capable of a wide range of component values and a digital computer to set individual element values and connect the elements into the desired network. Each synthetic element is made up of an independent power source, plus analogue and digital components. The application describes models for inductors, capacitors, resistors, thyristors and switching transistors. Element values are controlled in real time, allowing non-linear elements to be modeled by changing those values via a stored program or outputs from the model system itself. A prototype exists and has been used in laboratory demonstrations.

Simulateur à parité pour modélisation/314

Un inventeur américain offre les droits de fabrications au Canada de même que les droits mondiaux de commercialisation d'un modèle hybride souple et hautement interactif qui simule le fonctionnement de systèmes électriques haute tension comportant des dispositifs de commutation électroniques comme, par exemple, des transistors et des thyristors. Il existe une correspondance exacte ou "parité" entre la topologie du système simulé et celle du modèle, ce qui facilite grandement l'utilisation du simulateur et permet d'effectuer des expériences de conception du système sans devoir modifier entièrement le modèle. Il faut environ deux heures avant qu'un nouvel utilisateur puisse maîtriser suffisamment le simulateur pour obtenir des résultats valables. Le simulateur est formé d'éléments électriques synthétiques capables de représenter de nombreux composants de différentes valeurs et d'un ordinateur numérique dont le rôle est de régler les valeurs des divers composants et de relier entre eux les éléments de façon à former le circuit recherché. Chaque élément synthétique est formé d'une source d'alimentation autonome et de composants analogiques et numériques. La présente application décrit des modèles d'inductances, de condensateurs, de résistances, de thyristors et de transistors de commutation. La commande des valeurs des composants s'effectue en temps réel, ce qui permet la modélisation de composants non linéaires en modifiant la valeur de ces composants au moyen d'un programme en mémoire ou au moyen des valeurs de sortie provenant du système lui-même. Un prototype a été construit et a servi à des expériences en laboratoire.

Electronic Target Practice Gun/314

American inventor offers the manufacturing and worldwide marketing rights to a Canadian company for an opto-electronics gun that registers whether a shooter has hit or missed his target. Operating on a 9-volt battery and choosing a target that is lighter or darker than its background, when the shooter squeezes the trigger, the same scene visualized by the shooter is analyzed by the mechanism, again in terms of a brighter/darker object against its background. If the two coincide, the gun registers a hit; otherwise, it registers a miss. Prototypes have been extensively tested, both for consumer acceptance and for reliable operation, with outstanding results.

Fusil de tir électronique/314

Un inventeur américain offre les droits de fabrication au Canada et les droits mondiaux de commercialisation d'un fusil optoélectronique qui détermine si l'usager atteint ou non la cible. Le fusil est alimenté par une batterie de 9 volts. Le tireur vise une cible plus pâle ou plus foncée que l'arrière-plan de tir, presse la gâchette, et le dispositif analyse la scène vue par le tireur, toujours en termes d'une cible plus pâle ou plus foncée que l'arrière-plan de tir. S'il y a correspondance entre la cible visée et la scène vue par le tireur, le fusil enregistre un coup réussi; sinon, il enregistre un coup raté. Des études poussées, portant à la fois sur l'acceptation par le consommateur et sur la fiabilité d'exploitation, ont été effectuées et les résultats sont très probants.

TECHNOLOGY TRANSFER BULLETINS

Please contact the publishers for subscription prices.

(1) Licenses sought
(2) Licenses offered

(1) American Bulletin of International
(2) Technology Transfer
International Advancement
P.O. Box 75537
Los Angeles, California 90075

(1) Austrian Economic Bulletin
(2) The Austrian Trade Commission
2 Bloor Street, East
Suite 3330
Toronto, Ontario M4W 1A8

or

736 Granville Street, Suite 1220
Vancouver, B.C. V6Z 1J2

(2) Bulletin of the National Research Development Corporation
N.R.D.C.
P.O. Box 326
Kingsgate House
66-74 Victoria Street
London, SW1E 6SL, England

(1) Business America
(2) U.S. Department of Commerce
14th Street & Constitution Avenue, N.W.
Washington, D.C. 20230

(Forms for submitting proposals for inclusion in Business America may be requested from the offices of Consul General of the United States located in Canada.)

(1) CATECH Catalogue
(2) Louis Chalanset, Président
INNOVATION 128
38, rue des Mathurins
75008 Paris (France)

(2) Centre de Recherche Industrielle du Québec
245, boulevard Hymus
C.P. 570, Pointe-Claire/Dorval
Pointe-Claire (Québec) H9R 4S6

(1) Centre for Industrial Services TNO
(2) P.O. Box 94
2600 AB Delft
The Netherlands

(2) Czechoslovak Foreign Trade
The Journal of the Chamber of Commerce and Industry
Rapid Czechoslovak Advertising Agency
11279 Praha 1, UL. 28,
Rijna 13, Czechoslovakia

(Licensing offers from POLYTECHNA, Foreign Trade Corporation Technical Cooperation Agency are carried as an irregular feature.)

(1) Dr. Dvorkovitz and Associates
(2) P.O. Box 1748
Ormond Beach, Florida 32074

BULLETINS SUR LE TRANSFERT DE LA TECHNOLOGIE

Veuillez contacter les éditeurs pour le prix des souscriptions.

(1) Licences recherchées
(2) Licences offertes

(2) Electric Power Research Institute
Patent Administration and Licensing
EPRI
3412 Hillview Avenue
Palo Alto, California 94303

(2) ERDA Inventions Available for Licensing
Technical Information Center
P.O. Box 62
Oak Ridge, Tennessee 37830

(2) The Foundation of Osaka Science and Technology Centre
Technical Exchange Bulletin
The Office of International Affairs
1-8-4 Utsubo Hommachi, Nishi-ku
Osaka, Japan

(2) Government Inventions for Licensing Weekly Government Abstracts
National Technical Information Service
U.S. Department of Commerce
5285 Port Royal Road
Springfield, Virginia 22161

(1) I.D. Conseil
(2) 12, bis rue Jean Jaurès
92807 Puteaux, France

(1) IIL Monthly Review
(2) Institute for International Licensing
P.O. Box 1144
2109 Rijswijk (The Hague)
Oranjelaan 47, Holland

(2) INDUSTRIAL TECHNOLOGY Available from Japan
Research Development Corporation of Japan
Science Building No. 2
2-5 Nagata-Cho, Chiyada-ku
Tokyo 100, Japan

(1) The Innovation Centre
Enterprise House
Plassey Technological Park
Limerick, Ireland

(1) International Business Proposals
(2) Hazen International
38, rue Moscou
75008 Paris, France

(1) International Licensing
(2) Circulation Manager
92 Cannon Lane
Pinner, Middlesex HA5 1HT, England

(1) International New Products Newsletter
(2) Transcommunications International Inc.
Box 191
390 Stuart Street
Boston, Massachusetts 02177

(2) Inventions Catalog
Canadian Patents and Developments Ltd.
275 Slater Street
Ottawa, Ontario K1A 0R3

(2) Inventions Licensing Marketing Agency
P.O. Box 251
Tarzana, California 91356

(2) Japanese Breakthroughs 1980
Prestwick International Inc.
P.O. Box 205, Dept. 157
Burnt Hills, N.Y. 12027

(1) Le Marché de l'Innovation
(2) A.N.V.A.R.
13, rue Madeleine Michelis
92522 Neuilly-sur-Seine, France

(2) Licensintorg Bulletin of Technical Information
Assistant Trade Commissioner
Union of Soviet Socialist Republic
Trade Mission in Canada
95 Wurtemburg Street
Ottawa, Ontario K1N 8Z7

(1) Licensing, Joint Ventures and Other
(2) Business Opportunities in Connecticut
State of Connecticut Department of Economic Development
International Division
210 Washington Street
Hartford, Connecticut 06106

(1) Machinery Lloyd International
(2) Information Services Department
30A York Street
Twickenham TW1 3LJ, England

(1) Made in Europe
(2) Technical Equipment Catalog
21-29 Unterlindau
D-6 Frankfurt 1, Germany

(2) The Market Place
Supervisor, Industry Support Services
Division of Industry
Hearst Block, Queen's Park
Toronto, Ontario M7A 2E4

(2) New Products and Processes
Newsweek Building
444 Madison Avenue
New York, N.Y. 10022

(1) J.G. Smith
North East Lancashire Development Association
79-81 Church Street
Burnley
Lancashire BB11 2RS, England

(1) ONTAP Overseas New Technology and Products
Department of Economic Development
44 Pirie Street
Adelaide, South Australia 5001
(Available only to South Australian industry.)

(1) Refac
(2) Refac Technology Development Corporation
122 East 42nd Street
New York, N.Y. 10017
(High level industrial technology — no software nor consumer products.)

(2) Selected Business Ventures
Mr. Robert A. Roy
General Electric Company
Technology Marketing Operation
120 Erie Boulevard
Schenectady, N.Y. 12305

(2) Significant NASA Inventions Available for Licensing
Superintendent of Documents
U.S. Government Printing Office
Washington, D.C. 20402

(1) TechTrade
(2) R.G.F. de Groot, Publisher
VNU Data Publishing International bv
Post Office Box 71952
1008 ED Amsterdam
The Netherlands

(1) TechTrade Europe
(2)
(To be published in 1982. Contact the publishers of CATECH or TECHTRADE.)

(1) Technology or Know-How Available for License in Israel
Mr. Moshe Nahum, Director
Manufacturers Association of Isreal
P.O. Box 29116
Tel Aviv, Israel
(R&D bulletin published in Hebrew.)

(1) World Technology
(2) Patent Licensing Gazette
Techni Research Associates Inc.
Room 1
Professional Center Bldg.
Willow Grove, Pennsylvania 19090

(1) Worldtech Newsline
(2) Control Data Worldtech, Inc.
7600 France Avenue S.
Edina, Minnesota 55435

MOA

Bibliography

Reading material listed hereunder may be reviewed in public libraries or obtained from the original publisher as indicated.

When noted, copies of material are available from the Interlibrary Loan and Photocopying Service of the Canadian Institute for Scientific and Technical Information (CISTI), National Research Council of Canada, Building M-55, Montreal Road, Ottawa, Ontario K1A 0S2. Rates for reprints from CISTI are $2.20 per request for up to 10 pages and 22 cents for each additional page. Remittances in the form of cheques or money orders should be made payable to the Receiver General for Canada, credit N.R.C., giving all required bibliographic information; i.e. title, author, date of issue of magazine, and number of the pages.

Bibliographie

Les documents dont la liste est donnée ci-après peuvent être consultés dans les bibliothèques publiques ou obtenus des maisons d'édition, selon l'indication donnée.

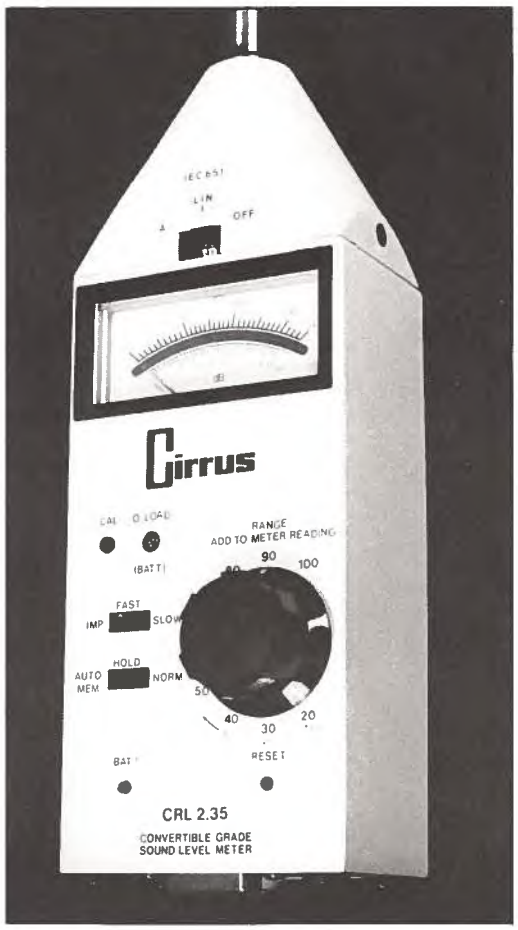
Dans les cas indiqués, des copies peuvent aussi être obtenues du Service du prêts interbibliothèques et de reprographie de l'Institut canadien de l'information scientifique et technique (ICIST), Conseil national de recherches du Canada, Édifice M-55, chemin de Montréal, Ottawa (Ontario) K1A 0S2. Le tarif des copies est de $2.20 pour chaque document de 10 pages ou moins et de 22 cents pour chaque page supplémentaire. Prière d'établir ses chèques ou ses mandats-poste à l'ordre du Receveur général pour le Canada, au crédit du Conseil national de recherches. Ne pas oublier de donner tous les renseignements bibliographiques requis: titre, auteur, date de publication de la revue et nombre de pages.

Trademarks in Developing Countries/314

Price: U.S. $25.00, 180 pp., by A. Vida PhD., Hungary, edited by Phil Mitches, London, Ontario. Discusses the economic and legal aspects of current and future developing countries' interest in the use of trademarks; whether they are considered a positive or negative right in their economic development; and the roles of trademarks for the development of under developed countries. Available from: LES International c/o P.O. Box 98, London, Ontario N6A 4V3.

Sound Level Meter
(See page 5) ▶

Sonomètre
(Voir page 5) ▶



Disassemblable Boat Carrier and Launcher
(See page 3) ▼

Remorque démontable pour mise à l'eau de chaloupe
(Voir page 3) ▼

IF UNDELIVERED RETURN TO:
Licensing Opportunities Section (34/3)
Business Centre
Dept. Industry, Trade and Commerce
Ottawa, Canada K1A 0H5

EN CAS DE NON-LIVRAISON RENVOYER À:
Section des possibilités de licences (34/3)
Centre des entreprises
Ministère de l'Industrie et du Commerce
Ottawa, Canada K1A 0H5

Canada Post Postage paid
Postes Canada Port payé
Third class
Troisième classe
K1A 0H5
OTTAWA

Government of Canada
Gouvernement du Canada

Industry, Trade and Commerce
Industrie et Commerce

Canada