the surrounding walls are built, the entire house can be made virtually disaster-proof, the Institute maintains. With six-inch brick walls used in the outer sections, the roof and the foundation are linked by three-inch steel channels on 24-inch centers. The additional cost for the entire project is estimated at less than 20% of the conventional cost.

#### **Estimated Costs**

A pamphlet that includes complete floor plans for the safety core is available free from Structural Clay Products Institute, 1520 18th Street, N.W., Washington 6, D. C. Plans for five brick and structural tile shelters are included in a 16-page booklet, "Clay Masonry Family Fallout Shelters," also free.

Costs are estimated at about \$300 for a "do it yourself" basement shelter of clay tile (with the cells filled with sand) or brick, \$500 to \$700 for a shelter built as an extra basement room while a new home is under construction, \$800 to \$1,200 for an underground clay masonry shelter outside the house, \$900 to \$1,250 for an outdoor aboveground clay masonry shelter suitable for wet or rocky terrain, and \$1.200 to \$1,700 for an aboveground blast and fallout shelter of reinforced brick.

Concrete, bricks, earth and sand are among the materials designated by the Office of Civil and Defense Mobilization as "heavy enough to afford protection by absorbing radiation."

Three feet of earth, or its equivalent in other heavy material, provides the best possible protection, the Office notes. This amount of earth provides about the same shielding as, for example, two feet of concrete, seven and one-half feet of wood or four feet of books. Stacks of books, magazines, newspapers or filing cabinets can be used "in a pinch," according to an OCDM booklet, "Facts About Fallout Protection."

• Science News Letter, 80:258 October 14, 1961

DENTISTRY

## **Detergent Food Soapless But Can Clean Teeth**

➤ THOSE DINNER-TABLE guests who cannot rush to the bathroom to brush their teeth immediately after eating can chew a piece of celery. This is a soapless "detergent," dentists say.

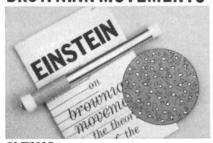
Dentists are now advising patients to eat celery, radishes and carrot sticks to remove other particles of food from the teeth. The tiny bacteria act quickly on sticky, highcarbohydrate foods because the food easily sticks to the teeth.

The acids produced by bacterial digestion can etch the enamel and produce a site for decay to begin.

This is causing dentists and physicians considerable worry, Dr. Philip L. White, secretary of the American Medical Association's Council on Foods and Nutrition, states in answer to a query in Today's Health.

• Science News Letter, 80:259 October 14, 1961

# BROWNIAN MOVEMENTS



## **NEW!** for viewing **Molecular Bombardment**

FREY SCIENTIFIC COMPANY 273 ORANGE ST. MANSFIELD OHIO

THIS REMARKABLE LOW-COST INSTRUMENT permits the observation of tiny smoke particles in collision with air molecules. You see an amazing demonstration of the kinetic theory of matter—which teaches that all molecules are in

theory of matter—which teaches that all molecules are in motion.

Students and science-hobbyists will sit for hours over this fascinating evidence of a basic law of the universe. The sight is the most convincing visual proof we have of the reality of molecules and their constant motion. The device is needed in every science classroom for the easy demonstration of Brownian movements, and will be wel-comed by amateurs who have never seen the phenomena. This original instrument, called the "BROWNIANSCOPE" (Trade Mark, patent pending), is a 200 power viewing device with special chambers and lenses for viewing collisions in gases. It is precisely constructed of high quality aluminum, glass and acrylic components. Anyone can use it — no other apparatus is required. Illustrated directions and a simple explanation are included. Send now for your BROWNIANSCOPE.

ONLY \$4.95 PPD.

Satisfaction augranteed — we back our claims.

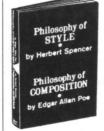
Satisfaction guaranteed — we back our claims.

Write for free catalog, soon available. Low cost science teaching aids and science fair materials.



½" diameter, ½" thick. Send only \$1.00 for 12 compasses.

HARRY ROSS Scientific & Lab Apparatus 61-L Reade St., N.Y. 7, N.Y.



## IF YOU WRITE FOR MONEY!

Enrich your writing by applying Herbert Spencer's and Edgar Allan Poe's classic principles that have inspired many of the world's greatest authors. Indispensable if you want to get published! Send \$1.00 to

PAGEANT PRESS Dept. SN 101 5th Ave., N.Y.C. 3.

### DAZZLE YOUR OPPONENTS WITH CHESS COMBINATIONS!

"Art of Chess Combination" by Znosko-Borovsky, only work teaching principles; acclaimed by champions and beginners alike. Basic ideas, how to interlock pieces, force occasions, etc. 233 pp. \$1.45, 10¢ postage. Money-back guarantee. Dept. SNL, DOVER, 180 Varick St., N. Y. 14, N. Y.



Avoid confusion of scraps of paper . . . lost opportunities . . . forgotten duties and ap-pointments. Use the MEMOGENDA. Permits constant survey of work ahead . . . results in working without strain. Checks out completed tasks and builds valuable history of activity. Users say they gain more time for living by making the best use of their working hours. MEMOGENDA is a 96-page book, wire bound in a flexible leather-like covering. The right hand pages (81/2 x 11) have numbered lines, one for each item. Opposite pages are for additional memos . . . includes instructions for use, an annual reminder, 3-year calendar, and active telephone list.

Price \$30 a dozen F.O.B. factory, or send \$3 for sample, postpaid. Full refund if it isn't the best investment you ever made.

### KANO LABORATORIES

1010 Thompson Lane, Nashville 11, Tenn.

**USED AND APPROVED** BY LEADING UNIVERSITIES Model RV-6 6-INCH



Finest American-made 6-inch reflector in its price range! Save \$100 or more, yet get all these fine features. f/8 6-inch mirror accurate to ½ wave • 3 matched eyepieces (75X, 150X, 343X) • 6 x 30 Achromatic finderscope • Heavyduty mount with setting circles • Rack & Pinion eyepiece holder • Sturdy lightweight tripod.

CRITERION MANUFACTURING COMPANY Dept. NL-92, 331 Church St., Hartford 1, Conn.

Criterion Manufacturing Company
Dept. NL-92, 331 Church St., Hartford 1, Conn.
☐ Under your unconditional guarantee, please ship me promptly the RV-6 DYNASCOPE.  My payment of \$194.95 is enclosed.
Please send FREE LITERATURE on the RV-6 Dynascope and your other DYNA-SCOPES priced as low as \$49.95.
Name
Address
CityState