## THE MAREETS.

The fall trade has not yet fairly commenced. Moncy is plenty, and the recent disbursements from the Treasury, and the influx of specie from Europe, serve to encourage speculation, which, hessed lessened demand or exports. Business generally is gracually remand for most of our staple productions. The prospects of the mor 1 y market are fair, and the increased demand for our Government securities abroad encouraging
GOLD-At last quotations. Money is obtained on call at 4 © 85 ASHES-Pots are quite dull, but with continued light receipts,
market steady. Pearls are nominal. BRICKS-Common Hard, \$12@13. Croton and Philadelphia
are unchanged at $\$ 14 @ 15$ for the former, and $\$ 40$ or or the latter. COFFEE-Slight advances for lower grades of Rio.
COPPER-Detroit, 31@313/2; Portage Lake, 31

ELOUR-Slight advance. Common brands, $\$ 850 \times 10985$; Genesce extra, $\$ 1025$ ल1 $\$ 1250$; Canada not in demana


IRON-Market dull. No. 1 American pig \$47@\$48. Scotch, $\$ 47$ pery quiet.

LEAD-Pig is steady, with a fair demand ; sales about 400 ton ordinary Forcign at $6, \mathrm{~V}_{2}$ cents gold.
Sheet and Pipe $\$ 10 \% 0010$ net cash.

##  

 LIME-No transactions. Rosendal Cement, $\$ 175$, cash.LUMBER-Eastern Spruce lower, with sales at $\$ 22 @ 22$ 50,




## NAILS-Cut are very firm and scarce, with a tendency to ad



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and Yelow C, 15\%.
WIRE-relegraph, 9c.@10c. for Nos. 7 and 11, and for hoop
sk irt, 50 c . for No. 18 covered, and 35 c . for uncovered.
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Texas, $15 @ 18$ for luferior, $20 @ 24$ for ordinary, and $25 @ 30$ for supe
rior.
ZINC-91/2c.less 4 per cent. for gold; 13/2c., enrrency, for Le

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In connection $\begin{gathered}\text { ith the publication of the SCIENTIFIC AMERI }\end{gathered}$ ers Patent" for newo inventions in the United States and in all for eign countries during the past twenty vears. Statistics show that nearly one-half of all the applications made for patents in the nite States are solicited through this office; while nearly Three-Fourtirs of all the patents taken in foreign countries ar
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IThis improvement was patented July 17, 1866. The entire patent right is for sale by Tully \& Reece, 235 Dock street, Philadelphia, Pa.
A Blowing Cave.
There is a natural curiosity in Georgia, known as the "Blowing Cave." It is situated on the plantation of Colonel David Barrow, Decatur county, Ga., twenty-seven miles from Thomasville, the termiuus of the Savannah and Gulf Railroad. The cave is at the bottom of a small natural basin (whose diameter at any point will not exceed thirty feet), in a perfectly smooth plain, and surrounded with a dense copse of wood. From the mouth of this cave issue strong currents of air, more like the boom of a piece of ordnance. M. with a continuous roar that is heard seventy yards Seguier concluded with requesting the Academy to off. At certain hours of the day, a hat or vail, or open a sealed packet he had handed in on the 19th other light objects thrown at it, are blown six or of March, 1849; this being done, it was found that seven fect high into the air, and at other hours of the M. Seguier had at that period entertained the idea day, with a suction relatively great, the mouth of the cave draws in any such article placed near it.

## Elastic Cartridges.

M. Seguier recently read an interesting paper to the French Academy of Sciences on a modification effected on rifles by a Belgian manufacturer. Several breech-loading rifles, of different calibers, were produced, the cartridges for which were so contrived as successively to conquer the inertia of the projectile by means of the gradual compression of an elastic body inserted between the powder and the missile, which consists of a steel cylinder rounded off at the top. M. Seguier also produced a plate of soft iron, $\$ 4$ millimetres (about half an inch) in thickness, shot through and through at a distance of 100 meters, a bullet weighing 45 gms . and a charge of $6 \underset{\mathrm{~g}}{\mathrm{gms}}$. of fine gunpowder; also a steel plate 29 millimetres, or more than an inch thick, likewise shot through at a distance of 100 meters, with a projectile weighing 125 gms. and a charge of 55 gms. of powder; the missile being in each case so constructell as to have its center of gravity placed far beyond the middle, and the powder being fired at the top of the cartridge just below the bullet, by means of
of placing an clastic substance (vulcanized indiarubber) between the ball and the cartridge.Mechanics' Magazine.

## Improvement in Fire Engines.

An improvement in fire engines has been recently tested by H. J. Johnson, of Providence, the object of which is to retain the water in the hose at full pressure when the engine ceases working. A faucet is attached to the nozzle, which shuts back the water whenever desirable, and the extra pressure operates upon a delicately-adjusted valve, in an at tachment to the engine, and which in fact becomes a part of it, which opens and permits the water to flow back into the engine. This relieves both hose and engine from any extra pressure. The engine continues working as long as may be desirable, the water in meantime circulating through the valve which ceases the instant the nozzle is opened and the water begins to flow through the hose,

Life Preser ver.-Mrs. Edson, of Cambridge, nl , has patented a very convenient life preserver, which deserves notice. It is easily inflated, and is so constructed that when the air is expelled, the preserver collapses, and can be carried in the pocket.

## WHITE'S MOP WRINGER.

Mopping floors is at best an unpleasant and dirty job. The long-handled mop saves much labor and prevents much fatiguc, but the strain on the muscles of the wrist in wringing the mop is considerable. The simple device here illustrated is a successful attempt to relieve the housewife of a portion of the annoyances of house cleaning.
It consists of a light wooden frame, the ends curved to correspond with the circumference of the pail, and is secured to the pail by means of a cam

lever under onc of the cross pieces. A roller, A, turns on journals in the frame, and another, B, re volves in a supplementary frame, C, pivoted at D. Spiral springs affixed to the frame at $D$ raise the pivoted frame and uncover the pail. When the mop is to be removed from the pail the frame, C , is pressed down by the foot, and held in position as the mop is drawn through the rollers. The attach. ment can be fixed permanently to a pail, ordetached and used on any proper vessel.
For further information address J. F. White, Brattleboro, $\nabla \mathrm{t}$.

In 1865 there were coined at the British Mint $1,450,238$ sovereigns, $1,834,750$ half sovereigns, $1,580,040$ florins, $5,619,240$ shillings, $1,631,520$ sixpences, 4,158 fourpences, $1,746,888$ threepences, 4,752 silver twopences, 7,920 silver pence, $8,601,000$ bronze pence, $8,064,000$ halfpence, and $4,050,200$ farthings. The halfpenny is the coin of which the largest number has been issued in the last ten years; in that time more than $153,000,000$ of halfpennies have been coined.


## INVENTORS, MANUFACTURERS.

The SCIENTIFIC AMERICAN is the largest and most widely circulated journal of its class in this country. Each number con tains sixteen pages, with numerous illustrations. The numbers for a yearmake two volumes of 416 pages each. It also containa fullaccount of all the principal inventions and discoveries o the day. Also, valuable illustrated articles upon Tools and Machinery used in Workshops, Manufactorics, Steam and Mechanical Engineering, Woolen,Cotton, Chemical, Petroleum, and all other Manufacturing Interests. Also, Fire-arms, War Inpplments, Ordnance, War Vessels, Rallway Machinery, Electric, Chemical, and Mathematical Apparatus, Wood and Lumber Ma chinery, Hydraulics, Oil and Water Pumps, Water Wheels, Etc., Household, Horticultural, a nd Farm Implements-this latter Department being very full and of great value to Farmers and Gardeners, articles embracing every department of Popula Science, which every body can understand and which every body
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