INFLATION - SOLUTION

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Searching for more information about the "1811 Guadeloupe 9 livres piece" reveals an interesting story about the cutting and stamping of foreign coins for use in the British (and earlier, French) colony of Guadeloupe. In the context of a crossword puzzle, the cut pattern is particularly notable:


There's more to the flavortext, but we can ignore it for now and focus on constructing the gridless crossword. The result is unusual but bears a passing resemblance to the cut coin:


Six across clues are unclued and marked by stars; reading these answers out spells the phrase NEW YORK WORLD CROSS WORD ONE. This is a reference to the world's first crossword, a small diamond-shaped crossword written by Arthur Wynne in December 1913 for publication in the comic section of the New York World. We then "repair" Professor Plum's coin by inserting Arthur Wynne's crossword (shown highlighted below):


The given crossword clues were divided into three parts: Acrosses, Downs, and Bonds. The eighteen bonds were previously unused but now serve to 'bond' the outer grid to the inner grid. For completeness, the bond clues and their answers are given below:

Alternative rock band:
Downside:
Fit together:
Flip-flop:
Gaze:
Homerun:
Inhabit:
Marine exoskeleton:
Mined currency:

PARAMORE
DRAWBACK DOVETAIL VOLTEFACE STARE TATER DWELL SANDDOLLAR VELDSPAR

Patron Saint:
Plantation:
Promenades
Sculpting clay:
Seasonal menu items:
Well-trained ECHL team?:
Woolen fabric:
Young men:

ANDREW ORCHARD SIDEWALKS
PLAYDOH MCRIBS
RAILERS
KERSEYMERE LADDIES

By process of elimination, we conclude that the eighteenth bond (the one marked '?') corresponds to the final answer to the puzzle, FUNDS.

## CONSTRUCTION NOTES

The concept for this puzzle took shape following the extremely coincidental and fortuitous discovery that Arthur Wynne's first crossword puzzle contained the word FUN, which could be 'bonded' out to create the answer FUNDS we needed for the meta. ${ }^{1}$ The actual construction of the puzzle was straightforward and took no more than a week: the grid was constructed to create a large number of splittable bond entries and the fill was optimized using the Crossword Compiler software. The Guadeloupe 9 livres piece from the intro/flavor text was introduced as a way to motivate the unusual grid shape and to make FUNDS a more thematic answer.

This puzzle went through several iterations before the current version stuck. One version, called A Time for Change, made it all the way to internal test-solving before we came to the conclusion that it was more fiddly than fun. The central gimmick in A Time for Change involved determining the dates of US coins given only the side opposite the date mark. An example is given below:


We identify the leftmost coin as the Three-Cent Bronze, an 1863 pattern coin which resembled the then-recently-discontinued Braided Hair Large Cent. The second coin is the Seated Liberty Dime (1837-1891). The 'CC' is a mint mark, indicating that this coin was minted in Carson City, Nevada, and the unusual placement of the mint mark above the bow implies a mint date of 1875. The third coin is a Three-Cent Silver (1851-1873), and the mint mark of New Orleans implies a mint date of 1851. The fourth coin is a Liberty Head Nickel (1883-1912), which was printed without the reverse-side text 'CENTS' only in the year 1883. Debiting the account by $1863+1875$ and then crediting the account by $1851+1883$ creates a net balance of 4 and produces the letter ' D ' in FUNDS. The other letters are produced in similar fashion.

I'm still interested in the overall concept of identifying images from the 'wrong side,' but this particular manifestation is held back by the fact that the sort of reverse-side differences which can uniquely determine the mint dates of a coin are often subtle and lost to non-numismatists.

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[^0]:    ${ }^{1}$ Arthur Wynne's use of the word FUN was not entirely unconstrained: Fun was the name of the comics section of the New York World. The word FUN in Wynne's grid is also distinguished as being the only pre-filled entry, which illustrates how to place words in the novel puzzle type.

