a core from the fiat paper group, including Spooner, Matthias Attwood, George Muntz and Henry Burgess, and added numerous bankers and businessmen, such as Richard Page, Henry W. Hobhouse, chairman of the committee of country bankers, William D. Haggard, and the eminent banker Alexander Baring, now Lord Ashburton.

7.7 Triumph of the currency school: Peel's Act of 1844

At the heart of the triumph of the currency principle in Peel's Act of 1844 was one man: the statesman and political genius Sir Robert Peel.[24] Peel has been habitually derided by historians as a confused middle-of-the-roader, a 'flexible' political opportunist, at best a transitional figure unwittingly performing the historical function of ushering in the Conservative and Liberal party system in England. But, as Professor Boyd Hilton has helped to point out, Peel was a far different figure: a statesman in the best sense, a Tory liberal who was consistent and even unyielding in principle and purpose, and flexible and 'entrepreneurial' only in attaining the best tactics to arrive at his fixed ideological goals. As Hilton has demonstrated, in every important sense, economic, financial and moral, Robert Peel was the John the Baptist, the founder, the 'progenitor of Gladstonian liberalism'.[25]

During the 1820s, Peel was for most years head of the Home Office in Tory governments. He had long been opposed to Catholic emancipation, and had even resigned his Cabinet post in 1827 in protest at the accession to the prime ministry of George Canning, head of Tory liberalism and champion of Catholic rights. Two years later, however, after the death of Canning, Peel, back as home secretary, was converted to Catholic emancipation as part of his ever-increasing devotion to the classical liberal, *laissez-faire* cause. At his conversion, Peel had the good grace to honour the prophets and warriors for Catholic emancipation whom he had opposed for so long: Fox, Grattan and Canning himself.

From 1831 on, Peel headed the Tory, now Conservative party, and also was the heart and soul of the liberal faction of the party. Peel's great prime ministry took place in 1841–46. Here he fought vigorously for a peaceful foreign policy, battling against the pro-war, imperialist Palmerston wing of the Liberal party, and managed to conclude peace with the United States in the menacing Oregon boundary controversy. Peel also managed to lower tariffs, but lost in his fight for all-out free trade. His great accomplishment on that front was victory over the furious opposition of the Tory agriculturalists led by Benjamin Disraeli, in the complete repeal of the infamous Corn Laws which had for decades established an enormous import tariff on wheat. In this fight against the artificially high price of food, Peel was spurred by the growing famine in Ireland. Again gracious in victory, Peel hailed his political opponent, the *laissez-faire* Liberal Richard Cobden, as the true architect of the repeal of the Corn Laws. For his success, Peel's government was toppled by Disraeli, and he died in a hunting accident four years later, in 1850.

Robert Peel's proudest achievement, however, was his banking reform, his Act of 1844. The Bank Charter Act of 1833 had provided for possible change in the charter during 1844, so that was the year of potential banking reform. As recent research has revealed, Peel's Act did not originate as a hostile 'strait-jacket, fastened on a reluctant (though subsequently complacent) Bank by the efforts of the Currency School'. Rather the Act came from within the bank itself, 'as an attempt by the Bank to find for itself a short-cut to currency management', as well as a means of obtaining its long-sought monopoly over bank note issue.[26] First, the ardent currency school leader, George Warde Norman, had, as a bank director, been promoting the plan since 1838. Although Norman lost within the bank on his currency proposal in 1840, he persisted, and the following year he became part of a five-man standing committee of the bank to discuss the scheme. By January 1844, William Cotton, the governor of the Bank of England, and a member of the standing committee, had been converted to the currency plan, and when, in early January, Peel asked Cotton and the deputy governor, J.B. Heath (also a member of the standing committee) to confer with him and Chancellor of the Exchequer Henry Coulburn about fundamental banking reform, Cotton was ready.[27] In response to these discussions, Cotton and Heath, on 2 February, submitted to Peel the complete outline of what was soon to become Peel's Act.

In essence, Peel's Act established the currency principle. It divided the Bank of England into an issue department, issuing bank notes, and a banking department, lending and issuing demand deposits. True to the rigid currency school separation of notes and deposits, deposits would be totally free and unregulated, while notes would be limited to a ceiling of £14 million matched by assets of government securities (roughly the extent of existing note issue). Any further notes could only be issued on the basis of 100 per cent reserve in gold. The second main provision was to grant the Bank of England its long-sought monopoly of the note issue. This was not done immediately, but to be phased in over a period of time. Specifically: no new banks were to issue any bank notes, existing banks were to issue no further notes, and the Bank of England might contract with bankers to buy out their existing notes and replace them with the bank's own. In this way, private bank notes were 'grandfathered' in, and the private (that is, joint-stock plus country) banks were neatly cartellized, under the direction of the bank, with the private banks able to keep out all further competition. This 'grandfather' cartel clause was not only designed to make the transition to the new order gradual; its main effect, and presumably its intent as well, was to bring the private banks – which might be expected to be the chief opponents of the new bill – around to become enthusiastic supporters.

In his manoeuvring within the Cabinet before publicly presenting Peel's Act, the prime minister made it clear that 'if we were about to establish in a new state of society a new system of currency', he would have preferred the Ricardian plan of government notes, with no Bank of England or any other bank notes allowed; but that this plan would be impracticable in the existing state of the real world, where a coalition must be built among such contending forces as the bank itself, Ricardians, free bankers and country bankers. The desideratum, Peel shrewdly advised, was to 'determine to propose the course which they may conscientiously believe to reconcile in the greatest degree the qualities of being consistent with sound principle and suited to the present condition of society'.

News of Peel's coming bank charter bill had spread by the end of February, and the country banks, as expected, vigorously protested the bill during March and April. Finally, Peel introduced the bill to Parliament on 6 May. Shrewdly splitting his opposition, he applied the bill fully only to England. The ban on new banks issuing notes was extended to Scotland and Ireland, but the limitations on existing banks were applied to England alone. For the rest, Scotland and Ireland were left alone for the time being.

The introduction of Peel's bill touched off a flurry of controversy, including a pamphlet war over the Act. In particular, the new controversy gave rise to the banking school, which beforehand had been represented only by Tooke. Tooke weighed in with an *Inquiry into the Currency Principle*, and John Fullarton entered the fray with his aforementioned pamphlet, *On the Regulation of Currencies*, a widely circulated and influential tract even though it was published in August 1844, after the passage of Peel's Act. S.J. Loyd published a defence of the bill, while the formidable Colonel Torrens blasted Tooke in another pamphlet.

The new banking school was noteworthy for being more royalist than the king, more favourable to the Bank of England than the bank itself. In short, the banking school, along with most of the London bankers, favoured the vesting of a monopoly of bank note issue in the Bank of England. Its quarrel was solely with currency principle restrictions on the bank's issue of notes. This was surely the kind of opposition that the Bank of England could live with. While the banking school correctly spotted the main weakness of the currency school in not treating notes and deposits alike, this objection was scarcely directed to extending any sort of reserve requirements to bank deposits as well as notes. On the contrary, they would have been all the more outraged by, say, a consistent Peel's Act that would have placed a 100 per cent reserve requirement on all further bank liabilities, deposits as well as notes.

One bit of *curiosa* about the emergence of the banking school is the lateness of its arrival; coming as it did almost when the fight over Peel's Act was over, and flourishing for a while after, its importance was more for raising theoretical issues and for raising the interest of historians of economic thought than in actually influencing the political battle.

Another noteworthy aspect of the fray was the advent of a new and important star in the economic firmament: John Stuart Mill (1806–73), who joined the banking school side of the debate in an anonymous article, 'The Currency Question', in the radical *Westminster Review*. Actually, Mill had foreshadowed the banking school in an article written at the age of 20, 'Paper Currency and Commercial Distress', in the short-lived radical *Parliamentary Review*. Like so many others, Mill was first moved to turn his attention to banking and business cycles by the economic and financial crisis of 1825–26. But in contrast to many others, he abandoned instead of extending his basic Ricardianism in this area.[28] Instead of seeing the new phenomenon of business cycles as created by monetary disturbances, he saw them as caused by waves of 'speculation', presumably generated by over-optimism. Money and banks were purely passive respondents to fluctuations in the economy. From this there followed his conclusion that movements in the money supply, at least under a gold standard, had no effect on prices or trade. Within the framework of a gold standard, prices rose first, dragging the money supply upwards, and later fell, pulling the money supply down.

How could Mill square this odd doctrine with his overall Ricardianism and its thesis of the influence of the supply of money upon its value? He did so by an ingenious, though bizarre and fallacious, theory of what constitutes the supply of money. The money supply was made up, not only of coin, notes and demand deposits, Mill opined, but also of the 'credit-worthiness' of every member of the public. When a bank made loans to some member of the public, then, it might increase notes or deposits outstanding, but that increase is exactly compensated by a decrease in the 'credit-worthiness' of the borrowing citizens. Therefore, when banks lend money to individuals and businesses, the money supply does not increase at all. On the contrary, when banks purchase government securities or finance its deficit, they add directly to the total money supply by the same amount. In fact, they even add to the money supply when they lend to private citizens beyond the degree of their genuine credit-worthiness. How is such 'credit-worthiness' to be determined? By banks confining their loans to sound borrowers, and to the discounting of 'real bills', that are short-term, matched by inventories of goods in process, and are therefore self-liquidating in a short period of time. Bank credit then happily follows the 'needs of trade' upwards or downwards, and cannot raise prices. While completely fallacious, Mill's theory at least had the merit of providing *some* plausible, logical explanation for the banking school creed – one that was scarcely matched by any of his colleagues.

Furthermore, Mill's doctrine provided a good reason for his devotion to the gold standard, and for his bullionist denunciation of inconvertible fiat money.

Within his theory, if government or the central bank issues inconvertible fiat paper, that paper adds directly to the money supply and to inflation rather than being neutralized by subtracting from credit-worthiness. And devoted to the gold standard he remained. We have already seen Mill's denunciation of Thomas Attwood's inflationary fiat paper scheme in 1833.

And what of the alleged free banking school, which Professor White has put forward as equally strong and vibrant to, and strictly separate from, the rival currency and banking schools? As White himself ruefully admits, they were nowhere to be found, their alleged devotion to free banking failing the most acid of all tests, when Peel's Act was about to bring all commercial banks under Bank of England control. For not only would the bank now have a virtual monopoly of note issue, but in order to obtain notes in exchange for cashed-in deposits, the other banks would now be obliged to keep the great bulk of their reserves at the Bank of England. White tries to explain away the defection of the free bankers as having been bought out by Peel's cartellization-'grandfather' clause: for the banks could continue to issue at their current level and no new competing banks would be permitted. But while this explanation is true enough, it raises the crucial question: how devoted were Professor White's heroes to free banking to begin with? Wasn't the free banking school simply a group devoted to the economic interests of the private commercial banks?

Take, for example, the newly founded *The Bankers' Magazine*, which had supposedly been a leading mouthpiece for free banking for the previous year. A writer in the June 1844 issue, while critical of the currency principle and the move towards monopoly issues for the bank, frankly approved the Peel Act as a whole for aiding profits of existing banks by prohibiting all new banks of issue.

And let us take in particular James William Gilbart (1794–1863), leading spokesman for the country bankers, manager of the London & Westminster Bank, and, according to Professor White, one of the main theoreticians of the free banking school. Gilbart, born in London and descended from a Cornish family, had worked all his life as a bank official and had written works on banking since the late 1820s. Since 1834, he had been manager of the London & Westminster Bank, continually clashing with the Bank of England. Despite Professor White's assurance that the free banking school men were even more fervent than the currency men in attributing the cause of the business cycle to monetary inflation, Gilbart held, typically of the banking school, that bank notes simply expand and contract according to the 'wants of trade', and therefore such notes, being matched by the production of goods, could not raise prices. Furthermore, the active factor goes from 'trade' to prices to the 'requirement' for more bank notes to flow in the economy. Thus Gilbart: 'if there is an increase of trade without an increase of prices, I consider that more notes will be required to circulate that increased quantity of commodities; if there is an increase of commodities and an increase of prices also, of course you would require a still greater amount of notes.' In short, whether prices rise or not, the supply of money must always increase! One wonders who the 'you' is who would have such requirements. On the free market, on the contrary, if there is an increase in the production of commodities, prices will tend to fall and *not* rise; furthermore, increased production of trade does not 'require' or call forth an increase in bank money. The causal chain is the other way round: increased bank note issue raises the money supply and prices, and *also* the nominal money value of the goods being produced.

All historians of economic thought except for Professor White have placed Gilbart squarely in the banking school camp as one of its leaders. Since White seems to agree with Gilbart's fallacious 'wants of trade' analysis, and since he admits that this creed is similar to that of the banking school, his creation of an important new school of 'free banking', challenging both of the others, appears all the more tenuous and artificial. The main difference seems to be marginal and political: while *all* the banking school hailed the banking system as useful and harmless, *most* of them laid special honours on the Bank of England, while Gilbart, as a joint-stock banker himself, placed most approval upon the commercial banks.[29]

When it came to the test, then, Gilbart, like his colleagues on *The Bankers' Magazine*, caved in on what Professor White alleges to be his free banking principles. Thus White concedes:

> He [Gilbart] was relieved that the act did not extinguish the joint-stock banks' right of issue and was frankly pleased with its cartellizing provisions: 'Our rights are acknowledged – our privileges are extended – our circulation guaranteed – and we are saved from conflicts with reckless competitors'.[30]

James Gilbart's open status as a banking school inflationist and Robert Peel's staunch devotion to hard money were both revealed in Peel's questioning of Gilbart when the latter testified that country bank notes are only issued in response to the wants of trade, and therefore that they could never be over-issued. He *also* claimed that the Bank of England could never over-issue so long as it only discounted commercial loans and did not buy government bonds.[31] At this point, Sir Robert Peel unerringly zeroed in and drew forth Gilbart's apologia for the banking system. Peel: 'Do you think, then that the legitimate demands of commerce may always be trusted to, as a safe test of the amount of circulation under all circumstances?' To which Gilbart admitted: 'I think they may.' (Nothing about exempting the Bank of England from that trust.) Peel then asked the critical question. The banking school all claimed to be devoted to the gold standard, so that the 'needs of trade' justification for bank credit did *not* apply to inconvertible currency. Peel, suspicious of that devotion to gold, then asked: in the bank restriction days, 'do you think that the legitimate demands of commerce constituted a test that might be safely relied upon?' To which Gilbert evasively replied: 'That is a period of which I have no personal knowledge.' This was a particularly disingenuous point coming from the author of *The History and Principles of Banking* (1834). Moreover, the issue is of course a theoretical one, and no 'personal knowledge' is necessary to make a reply – a point made immediately by Peel. At which point Gilbart threw in the towel on the gold standard: 'I think the legitimate demands of commerce, even then, would be a sufficient guide to go by...'. When Peel pressed Gilbart on the point, Gilbart began to vacillate, changing his views, returning to them, and then again falling back on his lack of personal experience.[32]

Peel was right in being suspicious of the strength of the banking school's devotion to gold. Apart from Gilbart's damaging revelations, his colleague at the London & Westminster Bank, J.W. Bosanquet, kept urging bank suspensions of specie payment whenever times became difficult. And while Thomas Tooke often proclaimed his abhorrence of the Birmingham school, he wrote in 1844 that a crucial limit on any over-issue of bank notes was the needs of trade *in addition to* gold convertibility. The opening was sufficient to allow Robert Torrens to score a palpable hit:

> After a careful examination of Mr. Tooke's recent publication, [1844] I cannot discover any very essential or practical difference between his principles and those of the Birmingham economists. Once deviate from the gold rule of causing the fluctuations of our mixed circulation to conform to what would be the fluctuations of a purely metallic currency and the flood-gates are opened, and the landmarks removed. Between the abandonment of a metallic standard as recommended by the Birmingham economists, and the adoption of arrangements hazarding the maintenance of a metallic standard recommended by Mr. Tooke, the difference in the practicable result might ultimately be nothing.[33]

John Fullarton's admission was even more damaging than Tooke's, avowing, in his popular 1844 tract, that he wholeheartedly agreed with the 'decried doctrine of the old Bank Directors of 1810' – namely, the anti-bullionist position that so long as any bank sticks to short-term real bills 'It cannot go wrong in issuing as many [notes] as the public will receive from it'. And of course 1810 was a year of inconvertible money. It is no wonder that Robert Peel considered all opponents of the currency principle as essentially Birmingham men.

Thus the opposition to Peel's Act, while theoretically important, was politically scattered and ineffective. The bill sailed through overwhelmingly, and became law on 19 July. A second Peel bill, designed to make it more difficult to establish new joint-stock banks, sailed through in September. The result of this tightening of bank control and monopoly as well as cartel privileges to existing banks, was, indeed, the creation of virtually no new joint-stock banks in England for the next eight years.

At this point, Peel completed his currency task by extending its sway to Scotland and Ireland in two bills that became law on 21 July 1845. Cautious in the face of regional traditions, Peel was not as tough on the Scottish and Irish banks as he had been on the English. Whereas the English commercial banks could issue no more bank notes period, the Scottish and Irish banks were treated as Peel's Act of 1844 treated the Bank of England: their *further* bank note issues were limited to 100 per cent gold reserves. Scotland had never had its banking restricted, having been free to establish joint-stock banks and issue notes and deposits throughout Scotland. The Scottish bankers, however, like Gilbart and the English bankers, were easily bought off by cartel privileges even more lucrative than in England. As White admits, 'Peel in essence bought the support of all existing banks by suppressing potential entrants and competition for market shares'.[34] In addition, Peel shrewdly permitted the Scottish banks to keep the privilege, denied to English banks (including the Bank of England) since the 1820s, of continuing to issue their cherished small (£1) notes.

The only important development in the year between the two Peel's Acts was the highly belated entry into the great debate of a new leader of the banking school, James Wilson, founder and editor of the notable new journal, *The Economist*. Wilson (1805–60)[35] had founded *The Economist* for the express purpose of battling for free trade and *laissez-faire*. He criticized Peel's Act when it came up in 1844, but devoted most of his energies to free trade. Finally, in the Spring of 1845, Wilson wrote a famous series of nine articles on 'Currency and Banking' in *The Economist*, attacking the extension of Peel's Act to Scotland and Ireland. Wilson took an orthodox banking school approach, except that each of his positions was so emphatic that the inner inconsistencies and contradictions of the banking school were brought out particularly starkly. Thus Wilson was far more emphatic and militant than Tooke or Fullarton about the importance of preserving the gold standard, so much so that Torrens was later to call Wilson 'the most able of the opponents of the act of 1844'.[36] And yet, of the Big Four of the banking school (Tooke, Fullarton, Mill and Wilson), Wilson was the only one who stated flatly and clearly that short-term, self-liquidating real bills would be sufficient to protect the banks from over-issue, even *without* specie convertibility. Thus, Wilson declared that

> inconvertible paper notes might be issued to any extent that legitimate transactions required them, provided such issues were confined to the discount of good

> bills of exchange, and to loans for short periods, without any risk of depreciation, because a larger quantity never could be so issued than was again shortly returnable to the bank in payment of such loans.[37]

In addition, of all the Big Four Wilson was the friendliest to free banking and desirous of saving the alleged free banking system in Scotland.[38] And yet he also claimed that the Bank of England could never over-issue in a convertible money system, which was quite the opposite of the free banking approach.

7.8 Tragedy in triumph for the currency school: the aftermath

As the Jacksonians and other currency counterparts in the US might have predicted, the currency school harboured a tragic flaw, an Achilles' heel that laid them low and turned their triumph into ashes: the neglect of bank deposits as a coordinate part of the money supply. And so, no sooner had Peel's Act been passed, when the Bank of England, happily ensconced in its briar patch of monopoly, central control, and note restriction but deposit freedom, began to expand its loans and deposits ad libitum. At the end of 1844, bank discounts had been £2.1 million and total bank credit £21.8 million. By the end of February 1846, however, bank credit expansion had been so intense that its discounts totalled £13.1 million and total credits £35.8 million. In short, in only a little over a year, total bank credits had risen by 64 per cent, and discounts by a phenomenal 424 per cent. This expansion was aided by the bank's drastically reducing its discount rate from 4 per cent to 2½ per cent, not only a huge quantitative reduction, but also a lowering of the rate from its traditional 'penalty rate' above the market, to the market interest rate, thereby greatly stimulating borrowing from the bank by banks and other debtors.

Notes of the Bank of England increased only mildly during this period; the huge rise, as we might expect, took place in bank deposits. In September, 1844, bank deposits totalled £12.2 million; by the end of February, 1846, they had doubled to £24.9 million. In the course of this enormous expansion, bank gold reserves fell sharply.

Most of this expanded bank credit poured into a speculative mania of investing in questionable new domestic railroads. In the years 1845 and 1846, over £180 million of new railroad construction was authorized, about double the total of the entire previous decade. Looking back on the period a few years later, *The Economist* referred to the 'mad scenes' of 1845 and 1846, and to

> the folly, the avarice, the insufferable arrogance, the headlong, desperate, and unprincipled gambling and jobbing, which disgraced nobility and aristocracy, polluted senators and senate houses, contaminated merchants, manufacturers, and

traders of all kinds, and threw a chilling blight for a time over honest plod and fair industry.

The bank tried feebly to stem the tide during the first half of 1846, but no sooner did bank reserves increase, than the bank, which had raised its discount rate to 3½ per cent in November 1845, dropped it back to 3 per cent the following August. Bank reserves then resumed their steep decline, falling from £10 million in August 1846, a ratio of specie to notes and bank deposits of 58 per cent, to only £3.0 million in April 1847, a ratio of only 20 per cent.

Again, the bank tried to check the tide it had created and continued to generate, but too little and too late. Interest rates rose with the inflationary boom, so that an increase of the bank discount rate to 4 per cent in January 1847 left the rate still under the market, and between 9 January and 10 April, total bank credits rose by £4.5 million and discounts by £3.8 million.

By April 1847, the Bank of England, as well as the entire financial and economic system, was in deep crisis: it increased its rate to 5 per cent, but market rates were now up to 7 per cent. Rejecting efforts by a minority of bank directors to raise the rate to 7 per cent, or even to 6, the bank made things much worse by keeping its rate at 5 and then rationing credit, suddenly cutting off discounts, calling in loans, and refusing to increase loans regardless of the credit quality of the borrower. The bank's refusal to raise rates and instead discriminate in favour of certain borrowers did not, however, save the commercial bank owned by the bank's own governor, W.R. Robinson, from stopping payments in July, or the bank of two other directors from going under in September.

The bank's sudden contraction, cessation of loans and credit rationing caused a severe business and financial panic in April and May of 1847. This drastic therapy finally eased the bank's own condition by the end of May, with the gold outflow temporarily reversing. By the beginning of July, the bank's reserves had doubled from £3.0 million to £6.0 million, a reserve ratio to deposits of 32 per cent. But no sooner had the pressure eased than the bank began to expand again, in the meanwhile making things worse by keeping its discount rate below the market and indulging in selective credit rationing. In September, the second great crisis of 1847 broke, and mercantile failures spread throughout September and October. Thomas Tooke lamented that 'These *mercantile* failures, in number and in the amount of property involved in them, were unprecedented in the commercial history of this country'. In October, the banks began to break, and bank runs began to spread through the provinces. As a result, the frightened banks began to contract their credit and deposits drastically, in order to increase greatly their percentage of reserves. The reserves of the Bank of England were down sharply once again, to less than 14 per cent of deposits. At that point, the Bank of England threw in the towel, and, for the first of many crises, requested the government to suspend the 100 per cent gold reserve restriction on notes imposed by Peel's Act. Delegations from Liverpool and the North, London private bankers, and members from Scotland also pressed hard for suspension of Peel's Act. The country bank organ, *Circular to Bankers*, charged that the London bankers were considering breaking the Bank of England by redeeming all their deposits. One wonders, in that case, how the commercial banks themselves could have avoided being broken in turn. At that point, the government predictably, and, for the first of many crises, itself threw in the towel by suspending the Peel Act provision of 100 per cent gold reserve restrictions on the issue of Bank of England notes.

The government saved the fractional-reserve system by obediently suspending Peel's Act on 25 October, thereby of course saving the day for the banks and alleviating the immediate crisis – at the expense of, in effect, giving up the currency principle and any attempt to tie the monetary and banking system directly to, and to the same extent as, the behaviour of gold. From then on, Great Britain, and eventually the rest of the world, was stuck with a fractional-reserve banking system issuing demand deposits, pyramiding on top of a central bank monopolizing the issue of notes and centralizing the nation's gold, and generating an endless round of boom–bust cycles of inflation and recession. Furthermore, with gold essentially centralized into the reserves of the central banks, it became easy for all these nations, even though allegedly committed to the gold standard, to go off that standard and on to fiat paper whenever any crisis – such as World War I – presented an alleged need for the rapid inflation of money to finance the war effort.

The heart and soul of the currency principle was a rigid tie of Bank of England note issue to 100 per cent gold reserve; but if this restriction was to be suspended whenever banks or businesses got into trouble, then the currency principle lay in shambles. As the prominent London banker George Carr Glynn correctly prophesied after the 1847 suspension, the public would expect another suspension in every future crisis. And sure enough, that is precisely what happened. In response to the 1847 crisis, there were committees of parliamentary inquiry in 1847 and 1848. The suspension of Peel's Act during the crisis of 1857 was easier, and while there were parliamentary committees in 1857 and 1858, there was, in contrast to the 1847 crisis, no debate on the floor of Parliament. And the suspension of Peel's Act in 1866 was considered so routine that there was not even the bother of a parliamentary committee of inquiry.

It is therefore remarkable that, from the time of the first suspension in 1847, the currency school, without exception, defended the suspension of Peel's Act, giving no sign of realizing that they were thereby abandoning their entire doctrine.[39] For not only did suspension in crises weaken the point of the Act, but also the knowledge that suspension would come to the rescue in any crisis emboldened the bank and banking system to expand credit as if the restrictions of Peel's Act did not exist at all. As a result, all that was left of the currency principle was the monopolization of notes by the Bank of England.

7.9 *De facto* victory for the banking school

It is a cliché that people are often appalled at the consequences of achieving their long-cherished goals. Because of the neglect of deposits, the enactment of the currency principle in Peel's Act in no way moderated bank credit expansion or the boom–bust cycle. Given the dashing of their dreams, the currency school, as in the case of all ideologues whose god has failed, could take several alternative courses of action. The most courageous would have been to admit that their principle was deeply flawed, to concede defeat, and to go back to the drawing board. Unfortunately, human beings are so constituted that they rarely opt for this noble course. Certainly none of the currency school distinguished themselves in this crisis. Instead, they took the route that all too many schools of thought, including the Marxists, have travelled: stoutly proclaiming that their theory is in excellent shape, while subtly but vitally redefining what the theory is all about.

For example, before 1844, the currency school, especially Colonel Torrens, adopted a monetary theory of the business cycle. Economic fluctuations were generated by bank credit expansion, led by the Bank of England, which led to inflation and booms, after which the inevitable contraction brought about bankruptcies and recessions. No sooner did the cycle of 1844–47 occur, however, when the currency men backtracked, virtually joining their old enemies of the banking school. The banking school had always proclaimed that banks and the money supply were merely passive respondents to boom–bust cycles generated by non-monetary forces in the 'real' economy. Usually the culprit was mysterious waves of 'speculation', presumably driven by waves of over-optimism and over-pessimism. Now, the currency school, even Colonel Torrens, proclaimed that they had never, ever promised an end to the business cycle, which is, after all, governed by such non-monetary forces as speculation and over-optimism and pessimism. The most that regulation of the currency could do, the currency school now opined, is to eliminate whatever part of the business fluctuations were caused by movements of the money supply. And this, they staunchly affirmed, Peel's Act had indeed accomplished. The business cycle of 1844–47 might have been severe, but it would have been far worse if Peel's Act and the currency principle had not been in effect.

Thus Colonel Torrens, in numerous apologies for Peel's Act, put the blame for the boom of 1844–46 on 'overtrading' and railway speculation, as if this speculation had come out of the blue and was not the consequence of cheap, expanding bank credit. He also mentioned that one aspect of the inflationary boom was 'rapid conversion of floating to fixed capital', that is, a sinking of liquid capital into an excessive amount of fixed, long-range investment. Again, there was no hint that it was excessive bank credit that had generated this over-investment.

It is revealing to compare two critiques by Torrens of Mill's contention that the currency school claimed to be able to cure all business cycles and 'commercial revulsions'. In 1844, in reply to Mill's essay in *Westminster Review*, Torrens pointed out that the currency school claimed to eliminate *not* all revulsions but only those originating 'in a currency fluctuating alternately above and below the level to which a purely metallic currency would perform'. But in his point-by-point 1857 critique of the banking chapter in Mill's *Principles*, Torrens shifted the emphasis. Instead of paring down monetary-based fluctuations to gold currency, Torrens now claimed that most fluctuations began, not in over-issue by banks, but in disturbances not caused by money, which left the money supply out of harmony with the gold supply. Furthermore, Torrens was now easily able to cite Loyd and Norman in support. Loyd, too, now focused on the alleged non-monetary causes of fluctuations. Focusing, as the banking school had long done, on optimism and speculation, Loyd declared that 'So long as human nature remains what it is, and hope springs eternal in the human breast, speculations will occasionally occur, and bring their attendant train of alternate periods of excitement and depression'.

Thus, with the currency school coming to agree with the banking school on the primacy of non-monetary, and the passive dependence of monetary, causes of the cycle, the way was paved for a *de facto* consensus between the two schools. Since the currency school seemed content with the existing system so long as it enjoyed the *label* of the currency principle, the money supply was now deemed passive enough. At the same time, the Bank of England had enough real discretion and flexibility to satisfy the banking school and reconcile it rather easily to the *status quo*. Thus James Wilson, a leading banking school critic of Peel's Act, was readily able to vote for its continuance in the parliamentary committee of 1857–58. The banking school was content, in the British banking system of 1844–1914, to achieve the *substance* of their own creed while allowing the proud currency men to bask in the *name*. For their part, the currency men enjoyed the laurels of an empty victory: Norman, Torrens and Loyd (after 1850 made Baron Overstone), enjoyed great prestige while proclaiming the *status quo* a triumphant embodiment of their principles. The Bank of England's directors were happy to embrace the supposedly restrictive currency creed, and new currency epigones relayed what had become standard doctrine: misinterpreting the existing system as currency-like, and ignoring the entrenching of the boom–bust cycle in economic life.[40]

With the currency school now committed to the banking school's non-monetary, 'overtrading' theory of the business cycle, and with such hard-money and free-banking writers as Robert Mushet and Henry Parnell gone from the scene, the currency analysis of the business cycle disappeared by default. Of the banking school analysts, the most important elaboration of the non-monetary cycle theory was that of James Wilson, in his *Capital, Currency, and Banking* (1847).[41] Wilson developed what might be called a non-monetary over-investment theory, which foreshadowed the later Austrian cycle theory but lacked the crucial monetary causal element. He focused on railroad over-investment as the cause of the 1844–47 cycle, and persistently predicted a crisis based on his analysis from 1845 until the time of the crash.

In Wilson's brilliant analysis, the boom begins with the excessive investment of savings in fixed capital. Savings are 'floating' or circulating capital, the wages fund that goes into the hiring of workers and buying of raw materials. But because of a sometime propensity to overtrade, businesses may invest in fixed capital beyond the annual supply of savings. Too many money savings are poured into the production of fixed capital, whereas too few are used to produce consumer goods. In short, the boom is characterized by an undue shift of resources from consumption goods to capital goods. The increased expenditure on fixed investment of capital – in the 1845 case heavy railroad investment – on the other hand, increases wages in the hands of consumers. But as the consumers come to spend their wages on a lower supply of consumer goods, the price of consumer goods will inevitably rise. In short, consumption and investment have become excessive in relation to the savings available. In response to the rising prices of consumer goods, consumer goods producers will attempt to expand output and thereby increase their demand for capital, i.e. their demand for loans. But the dearth of savings in relation to the demand for capital will bring about a rise in the rate of interest, and the sharp rise in interest rates will precipitate a recession. In short, the fixed investment-boom producers, in this case, the railways and suppliers of railway material, would be forced into a sharp scramble with the producers of consumer goods for suddenly scarce capital, and the resulting crisis and depression causes the abandonment or indefinite postponement of the excessive fixed investments. During the depression, excessive investment is abandoned, resulting eventually in recovery to a sound and normal condition.

Thus Wilson, in addition to seeing the unwise and excessive investment as well as the overconsumption and undersavings of the boom, demonstrated how the boom is the economic distortion that necessarily generates the unhappy but curative depression that finally restores a sound economy. He also saw how a rise in interest rates, as a signal of overconsumption and undersaving, brings about the restorative recession. In addition, he realized that a lack of savings was a key to the recession and concluded that greater savings would help speed the recovery.

While there is surely over-investment in the higher orders of capital goods during a boom, Wilson misfired when making his sharp distinction between floating and fixed capital. To Wilson, money savings going into fixed capital are somehow lost or 'sunk', and thus disappear from the payment of wages. The problem is not in fixed *vs* floating capital, however, but consumption as against over-investment of all types in the higher orders of capital – whether in fixed plant or greater inventory of raw materials.

But the greatest problem in Wilson's discussion was his neglect of money. Money, he believed, was merely a device for facilitating exchanges, and therefore could never be a cause of economic fluctuations, but only an effect. And yet, if money was not involved, where do the railway firms *get* the new money to spend, even though savings have not risen? The only answer, which Wilson neglects, is an increase in money and bank credit loaned to those firms. And, if the money supply has not increased, why are the increases of wage payments by railway firms and other capital producers not offset by *declines* of wage payments in consumer industries? In short, why does the general level of prices increase from the beginning of the boom? Why don't consumer prices at least initially fall? The answer, once again, is the increase in the supply of money and credit that generates and fuels the boom. And finally, why can't the general run of businessmen, including the railway magnates, realize that their investments are outrunning savings, and why does the eventual critical rise in interest rates come as a shock? The answer, once more, is that the expansion of bank credit artificially lowers the interest rate, and lures business firms into the fatal over-investment.

Despite the fact that Wilson insisted that a quantity of money must not be confused with capital, he yet fell into the old Smithian trap of considering the supply of gold as 'idle and unproductive' capital, and so he believed that capital could be increased, and the depression greatly eased, by government issue of £20 million of small, £1 notes, which would replace the 'idle and unproductive' £20 million of gold in circulation. This huge issue, Wilson assured his readers, would not be inflationary because it would simply add to capital; and besides, he added smugly, no inflation could exist since the paper notes would continue to be convertible into gold. But what sort of gold convertibility, what sort of gold standard, exists when gold is supposed to disappear from circulation? The lesson is that, regardless how much devotion is professed to *laissez-faire* or the gold standard, at the heart of every banking school man, including those professing a free banking position, lies an unreconstructed inflationist.

In his *Principles of Political Economy* (1848), John Stuart Mill set forth a cycle theory that blended Wilson's analysis with a Tookean emphasis on commodity speculation, and unfortunately brought in the Ricardian gloom about the alleged inevitable tendency toward a falling rate of profit as agriculture yields ever lower returns. Mill, in short, fused the standard Tooke–banking school emphasis on speculation, over-optimism, and overtrading with Wilson's analysis of the conversion of circulating into fixed capital. Once again, the doctrine was *non*-monetary, with money playing a passive, non-essential, and at best secondary role. Thus Mill adopted Wilson's railroad investment theory of the cause of the recent 1845–47 cycle. The Ricardian motif led Mill to anticipate Schumpeter and hail the inflationary boom as necessary and vital to the achievement of economic growth, by enabling a periodic escape from the falling rate of profit. As a result, Mill was among the first to develop the idea that business fluctuations tend to repeat as recurring cycles, a process which he considered beneficial. He was not worried about recessions, since the contraction and Say's law ensured a rapid return to full employment and prosperity.

There was another important reason for the effective fusion of the currency and banking schools after the enactment of Peel's Act. Both these groups, after all, were dedicated to retention of the gold standard as their top monetary priority, even though the banking school version tended to be highly attenuated. But as soon as the great crisis of 1847 occurred and brought monetary and banking controversy back to Britain, the ultra-inflationist opponents of the gold standard came on the attack, calling either for fiat money inflation or, at best, a bimetallic gold/silver standard. In the face of this onslaught, the currency and banking schools closed ranks, which largely accounts, for example, for James Wilson's voting to retain Peel's Act in 1858.

In fact, it took no more than the crisis of 1847 to encourage the men of Birmingham to resume their assault on gold. Matthias Attwood's old fiat money pamphlet was promptly reprinted, a Birmingham delegation headed by George Frederick Muntz called upon the prime minister, and the Birmingham Currency Reform Association sent a memorial to the queen. The *Times* felt called upon to denounce the Birmingham men in an editorial and T. Perronet Thompson warned a friend of an increasing flow of 'half-mad pamphlets from Birmingham'. And other sectors in the north of Britain joined in the cry. The Liverpool Currency Reform Association was active enough to be denounced in two issues of *The Economist*, and Scotland revealed its inflationist bent by an anti-gold article in the Tory *Blackwood's Edinburgh Magazine*. Furthermore, an organizing convention of the National Anti-Gold Law League was held in Glasgow and was attended by 3 000 people.

The threat of silver bimetallism also surfaced during the crisis of 1847. Particularly important was the powerful banker, Alexander Baring, now Lord Ashburton, always ready to ride his hobby horse of bimetallism, and a peti-