



Say "ADHD" and "Ritalin" and people think problem kids who can't focus, or sit still, or behave. But while many grow out of it, a third continue to have the debilitating symptoms as adults. **Nikki Barrowclough** reports on the grown-up version of attention deficit hyperactivity disorder.

**A**ROUND DUSK, A MIDDLE-AGED WOMAN SLIPS OUT OF THE building in Sydney where she works as a statistical analyst and researcher. Highly intelligent, with a passion for music and murder mysteries, she's popular with colleagues, although sometimes she gets mystified emails from senior management in reply to *her* emails, which are indecipherable. Not that she dwells on this as she drives home. Half an hour after leaving the office, she unlocks her front door and walks into a wild, anarchic, mind-boggling mess.

I meet Rosemary\* early one evening. She lives on the top floor of an old block of flats. It's a nice neighbourhood – and it's probably a very nice flat. But it's impossible to know because the interior is crammed with incredible piles of jumbled-up possessions and paperwork, domestic clutter and junk. In the kitchen, a dresser and table are half buried under a tangled mass of bills and bank statements, income-tax documents and thousands of other unidentifiable bits of paper, as well as books, CDs, pens, cups and saucers, bottles of vitamins and items of baby clothing. In the living room and bedroom, the piles threaten to engulf everything. An old-fashioned bellows organ and a piano are like bulwarks against the rising tide.

Half the bed is almost invisible. Every night, Rosemary sweeps hundreds of books, old TV guides and magazines onto the floor – and every morning, after making the bed, she puts them all back. For the past 34 years, she has been taking Ritalin, one of the stimulant drugs commonly prescribed for the treatment of ADHD, attention deficit hyperactivity disorder. This is the part of her life she keeps hidden.

We talk, not at her place – it's impossible – but in the flat directly opposite. The owner, an old friend of Rosemary's, is one of only two people who know her secret (the other is a close workmate). A nurse with psychiatric training, she doesn't believe that ADHD exists. She thinks her friend is just lazy. "I am lazy," agrees Rosemary. "I could tidy up."

Plainly, though, she can't. She doesn't know how to make decisions about what to keep and what to throw out. Paperwork, for some reason, totally confuses her. "I pick up bits of paper and they turn into 10 bits of paper that I can't get rid of," she explains.

It's just as well she owns her flat, which she bought in 1978. She lives there with two cats and, lately, a small dog. The baby clothes I saw are for the dog, which was on death row when Rosemary spotted its photo on an animal-rescue website. She jumped in her car and drove off to the pound in a distant suburb without a moment's thought.

When does impulsive behaviour stop being a sign of a generous spirit and become something more disturbing? The wonderful old organ in the





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flat was bought on a whim. As was the piano. Rosemary explains that both her parents were gifted musicians. Then there's no mystery about buying a sandwich *and* a piano in her lunch-break, I suggest. Maybe, she replies – before recounting her other memories of childhood.

“My father would mow half the lawn and stop,” she says. “He could play a piece of exquisite music to the end, but everything else he did, he left half finished. My brother was expelled from kindergarten for never going to sleep and getting up and waking all the other kids and banging doors. A cousin of mine had an office with piles and piles of paperwork all over the floor, with little tracks for visitors to walk through.”

Rosemary's life started to go off track during her teenage years. It started in high school, where she found it difficult to concentrate. University was worse – she dropped out. She tried teachers' college and failed that, too. She eventually completed an arts degree by correspondence while working full-time, but couldn't shake the feeling that she functioned differently from other people. She made friends, but didn't really understand the mechanics of relationships. She became depressed, anorexic and started smoking – up to 100 cigarettes a day. It's sometimes difficult to follow her story because her sentences don't always run in sequence. The hardest thing for her, though, is describing what was actually wrong.

**R**OSEMARY WAS 25 WHEN SHE MET THE GP who put her onto Ritalin. He didn't diagnose the troubled young woman, but he was the one “who began to see all the bits”. This was in the '70s, the decade in which hyperactive children were beginning to be prescribed stimulant drugs for a condition known in those days as minimal brain dysfunction.

There's no doubt that taking Ritalin made a huge difference, she says: “What it did was make me really organised, and it made me want to stay at work. It also got me past the area of feeling inadequate. Like the thing of not being able to present ideas properly. Have you ever seen that cartoon where this woman is at a meeting and the boss says, ‘Thank you, Miss, that's a good idea; would one of the men here like to have it?’ I kept that cartoon for years because that's how I felt.”

By 1980, minimal brain dysfunction had become attention deficit disorder (ADD). The ensuing decade saw an explosion of ADD diagnoses in children. In 1994, two American psychiatrists, Edward M. Hallowell and John J. Ratey, wrote a

bestseller, *Driven to Distraction*, about the disorder – describing it as an inherited neurological syndrome whose “classic, defining triad of symptoms” included impulsivity, distractability and hyperactivity or excess energy.

In her mid-30s, Rosemary was diagnosed with ADD by an eminent Sydney psychiatrist. It was known by then that ADD could persist into adulthood, but the research was still very new.

In the late '80s, ADD morphed into ADHD and, today, the disorder is divided into three subtypes: predominantly inattentive, predominantly hyperactive-impulsive and a combination. Rosemary has been diagnosed with ADHD combined. In other words, she has the lot – chronic impulsivity, distractability and restlessness (yet she can also hyperfocus), organisational and planning problems, memory problems and short attention span. She is easily frustrated. “It's this lack of control: you're trying all the time to get yourself under control. It's much better with the medication. Life would be totally chaotic without it.”

She has kept her condition from colleagues, fearing they'll think she's playing the ADHD card to slacken off at work. “It sounds like a cop-out,” she says. “It sounds like I'm suddenly going to say at work, ‘Uh-oh, I can't manage.’ So I'm tirelessly bossy to make it look like I can manage. And I do, yes.”

But what about those emails – the ones senior management can't decipher? “They make perfect sense to me when I read them before sending them off. But my mind does these big mental hops and I tend to get stuck on some aspect or another and I forget all the other bits. It's only when I get replies back, ‘What are you talking about?’ that I realise I've left out major parts of what I wanted to say.”

Last year, Rosemary attended a course run by clinical psychologist Dr Caroline Stevenson, coordinator of the Adult ADHD Clinic at the NSW Institute of Psychiatry. It was the first time she'd met others with the disorder and discovered they had a lot in common – like being “funny” about relationships. “If someone rings and asks you out for dinner, you say, ‘Not tonight. How about in six weeks' time? Or 20 weeks? How about if I ring you?’ Because we always say inappropriate stuff.” What does she mean? “That colour doesn't suit you” or “You look like shit”, for example.

During the course, she started clearing up her flat, and says it was because someone (Stevenson) was paying attention to her. “It's just my theory,”



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she says hesitantly. But don't her friends pay attention to her? "If I let them," she replies. A second's silence. "I don't really keep up with any of them much. Just the people I work with.

"Why couldn't there have been a course like that when I was in my 20s?" she goes on sadly. "It might have made such a difference to my whole life."

Then, changing tack so swiftly it's as if she hasn't spoken, she deliberately mocks herself. "You get really dramatic and you hear the orchestra strings..." And raising her arms in a theatrical manner, she begins playing an imaginary violin to hide how close she is to tears.

**A**DHD IS ONE OF THE MOST COMPLEX DISorders of our times, and one of the most controversial. It's not new – it first showed up in medical literature a century ago – but the definition keeps evolving. The short version goes like this: people with ADHD have trouble regulating their thinking, learning and behaviours due to a vulnerability in the hardwiring of the brain. Then again, isn't that the case with any psychiatric or psychological condition? The cause or causes are still unknown, although there are some solid theories. IQ is not a factor. Genes are. The symptoms are familiar, but can be ambiguous. For instance, you might have trouble concentrating on some occasions, but still be capable of the seemingly incongruous ability to "hyper-focus" at other times.





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And the word “disorder” is open to interpretation. Some people say ADHD has destroyed their lives. Others, that it’s responsible for making them more exciting human beings, able to seize the moment and pursue the exhilaration in life.

Take the ex-banker turned financial consultant I meet, who was diagnosed a year ago, aged 50. He’s textbook: high energy, impulsive, constantly juggling ideas, leaping from one thought to the next. Like everyone else, he has an opinion about the stimulant drugs used to treat ADHD in Australia – the best known being Ritalin.

“The whole medicalisation of personality is interesting, isn’t it?” he remarks, having mentioned that, after he was diagnosed, he “fooled around” with various medicines, including Ritalin, before deciding drugs weren’t for him. “I got to 50 reasonably successfully without knowing about this thing I apparently have. There’s no doubt that we ‘hunters’ do struggle with some of the disciplines of this world, organised as it is these days around ‘farmers.’ We get distracted and have to spend masses more energy staying on some tasks, and impulsiveness obviously has risks.

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(As I quickly discover, you can’t write a story about ADHD without hearing about hunters versus farmers. Thom Hartmann, a well-known American author and former psychotherapist, suggested in the early 1990s that ADHD behaviours were vestigial hunting skills handed down to us from primitive hunting/gathering society when a vastly different personality was necessary for survival. Today, only the “farmers” fit into modern post-agricultural cultures. The theory continues to provoke debate among psychiatrists worldwide.)

Sydney psychiatrist Dr Mark Kneebone, a senior lecturer in psychiatry at the University of NSW, is equally thoughtful about how we view the condition. “We medicos like to pathologise everything,” he says. “We like to see ADHD as a disorder. But, in many cases, I think it’s a double-edged sword. It’s associated with disabilities, but it can also be associated with strengths. The purpose of the treatment is to reinforce these strengths.”

Sceptics say that different styles of behaviour and thinking are being defined as a disorder from which pharmaceutical companies are benefiting. That’s a whole other debate. The crucial point about ADHD is that it defines behaviours and thinking that cross the line between usual and

unusual. It’s not the symptoms themselves – it’s the extent to which they affect people’s lives.

**M**EANWHILE, THE REST OF US HAVE GONE from scoffing at the diagnosis in children, to scoffing at the diagnosis in adults, to surreptitiously surfing websites to see if we’ve got the disorder (“Click here for *your* free assessment”). Dr Julian Trollor, a neuropsychiatrist and senior staff specialist at the Neuropsychiatric Institute at Sydney’s Prince of Wales Hospital, adopts a resigned approach towards internet symptom checklists. He says that in his experience, when people who suspect they have ADHD are properly assessed, only about half turn out to have the disorder. Very often, the issue is more about what’s happening in someone’s life: “When we’re stressed or sleep-deprived or have other problems, obviously we’re not going to be functioning well. So we may complain of symptoms – or those symptoms may come to our attention – during those phases.”

No one knows how many adults in Australia

have ADHD. According to the 2006 NSW Chief Health Officer’s Report, 2803 people with ADHD aged over 25 years were receiving stimulant medication as of December 2005. In Victoria, there are 1172 permits for prescribing stimulant drugs to individual adult patients.

It’s often the case that parents of children diagnosed with ADHD, realising that they displayed the same behaviours when young – and still do – have themselves assessed, too. Then again, people who went undiagnosed in childhood might never know they have the disorder, especially if their symptoms decrease with age, as can happen.

This only makes the phenomenon more intriguing, since many of these people develop their own mechanisms for managing their symptoms without medication. Julian Trollor comments that it can be equally complex when people who were diagnosed in childhood find symptoms such as hyperactivity or impulsivity decreasing over time. “Do you say they have ADHD, residual ADHD, or ADHD in partial remission? Do you treat those people – or not treat them?” he asks.

Some may be referred to psychiatrists who remain sceptical of the condition in adults, even though research suggests that one third of children with the disorder will continue to have symptoms through adolescence and into adult-



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### **Do I have it, don't I have it?**

The diagnostic criteria recommended for use in Australia are taken from the Diagnostic and Statistical Manual (DSM) of Mental Disorders, issued by the American Psychiatric Association. Significantly, DSM doesn't specifically define the adult syndrome: the 18 listed symptoms were initially developed for use with children.

An adult can be diagnosed with one of the ADHD subtypes if he or she has at least six of the nine relevant symptoms. According to the NSW Public Health Bulletin, it's been suggested that in adults aged over 50, lowering the cut-off to as

few as three symptoms on each list is still valid. The symptoms must also have been present since early childhood (prior to the age of seven).

Symptoms for the inattentive subtype include difficulty sustaining attention, not seeming to listen when spoken to directly, failure to understand instructions, difficulty with organising tasks, and avoidance or dislike of tasks or activities that require sustained mental effort. The hyperactivity-impulsivity list includes fidgeting with hands or feet, feelings of restlessness, talking excessively, an inability to wait one's turn and often interrupting conversations.



hood. Professor Florence Levy, from the school of psychiatry at the University of NSW, and a world authority on the disorder, says ADHD that persists into adulthood shows the strongest genetic links.

The problem for the medical profession, as Christopher Tennant, professor of psychiatry at Sydney University remarks, is that there's no specific diagnostic test. "It's very difficult to say that it does or doesn't exist: it's all based on an intense, objective appraisal of people's behaviour," he says, also pointing out that, just to complicate matters further, other medical conditions and disorders can imitate or coexist with ADHD. Talk to enough doctors and you'll be left in no doubt of the diagnostic uncertainty surrounding the disorder.

One area of controversy is the overlap between ADHD and bipolar disorder. "About 20 per cent of people with ADHD have bipolar mood swings," says Mark Kneebone, "and, clinically, the symptoms are similar – mood swings, hyperactivity, depression and cognitive problems. Teasing out these conditions can be very difficult."

"The first task is a thorough evaluation of childhood history, because you can't suddenly have adult ADHD," qualifies Caroline Stevenson, the clinical psychologist whose courses Rosemary attended. She adds that the overlap between ADHD and learning disorders is also enormous.

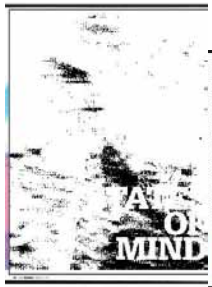
ADHD symptoms are seen in a wide variety of settings, agrees Trollor. "In some of my patients with epilepsy, there's been some sort of brain 'insult' early in life that's not only led to seizure disorder, but to attention deficit and behavioural problems. I see people with intellectual difficulties, who presumably have some sort of diffuse problem with brain function, who may have a disproportionate level of high impulsivity, inat-

tentiveness and disorganisation. I see people who've had head injuries who have almost an acquired ADHD. I see people with fluid on the brain who have attention and memory problems. We don't call them ADHD, but recognise their symptoms are secondary to another condition.

"But perhaps common brain markers in these other disorders could help us understand the biological basis for ADHD. And perhaps the treatments could also help us understand how we should treat the attention and behavioural problems seen in other neurological conditions. The diagnosis will be further refined as we understand better the genetics of the different disorders, and how brain biology impacts on human function."

At the Brain Dynamics Centre at Sydney's Westmead Hospital, associate professor Lea Williams and her team have used EEG (electroencephalograms, technology that measures electrical activity in the brain) to study 500 people, both adults and children, who've been diagnosed. "One of the really strong measures indicating ADHD is that the activity of someone's brain actually shifts," she says. "So they have a lot of what's called slow-wave activity, which is normally most obvious when you're asleep. It's like the brain is a bit sleepy – except you're awake, [which is why] it's really hard for people with ADHD to concentrate."

Williams says the disorder was once thought to be a condition resulting from an "immature brain" – one that would eventually catch up. (The theory made sense: young adolescents go through a period of tremendous brain growth and development.) But the study, she says, has shown a very similar pattern of "sleepy brain" activity in adults diagnosed with the disorder. "It's either the case that the brain is remaining in an undeveloped



state for their whole lives, or there's some other explanation. Normally the way your brain is regulated is that you're awake and alert when you need to be, and sleepy when you need to be. So it's about the brain being able to regulate itself. If it doesn't, you could get this kind of hyperactivity and inability to concentrate," she says.

**O**NE MORNING I HAVE COFFEE WITH AN OLD friend who was diagnosed a few years ago, at the age of 52. Sure, his conversation was often scattered, he'd repeat sentences, talk over everyone else – and was noticeably distracted in manner. Despite a background in economics, he lost job after job. But like many people, I didn't believe adults could have ADHD and thought the diagnosis ridiculous. When we meet, though, he tells me things I never knew – how, as a teenager in Switzerland, he was attracted to extreme sports. That he got into unusually violent fights with other boys. That his school marks were either brilliant or atrocious. As he talks, I suddenly remember the stacks of newspapers he could never throw out when he still lived with his wife and children. (His marriage –

**"The saddest calls and emails are from people who really love their partners but can't live with them any more."**





his second – ended soon after his diagnosis.)

He tells me that he took dexamphetamine briefly and says that while it balanced his moods and made him more focused, he didn't like the drug's effects. "I had slight migraines and clumsiness. I dropped things," he remarks, adding that he has returned to regular swimming, which is helping him focus more efficiently than medication.

"Once you know you have ADHD, you make yourself concentrate so that people don't pick the symptoms," he goes on. "I'm conscious all the time of coaching myself to do things – the shopping, business deals. I do waste a lot of time. I'll have a schedule, but I won't stick to it."

Caroline Stevenson has seen first-hand the havoc the disorder can wreak on people's lives, as well as the despair of those who feel others don't understand what they're going through on a daily basis. "People talk about ADHD in a jokey fashion," she says, adding that depression was once discredited the same way. "ADHD is not an easy condition to understand, to treat or to live with. However, there's no longer any argument that people who have been diagnosed function differently from those who don't."

The dark side of the disorder is increasingly well documented: ruined marriages, wrecked or lacklustre careers, drug addiction, alcohol abuse, domestic violence. Prisons are full of people with undiagnosed symptoms, say mental health professionals. Joy Toll, NSW secretary of the support group ADDults with ADHD ([www.add.org.au](http://www.add.org.au)), frequently sits up until midnight answering emails from people desperately seeking help. "They also ring on our help line. 'I think I've got ADHD. Where do I start? Where do I go?' The saddest calls and emails are from people who really love their partners but can't live with them any more."

Brenda Inglis-Powell was determined that her marriage would never get to that point. Her husband, Sydney psychologist Dr Peter Powell, 62, was in his late 30s when he was diagnosed. Their hyperactive son had been diagnosed with the condition a few years earlier, aged 13, when the family was living in the US. (Their parenting experiences have led the couple to write a book, *Raising Difficult Children*.) Inglis-Powell had always seen parallels between her husband's and son's behaviours.

"Peter couldn't cope with tasks," she says. "He could mow the lawn, put the dishwasher on, but something like packing a picnic basket – he'd forget to put in so many things. We learned early we had to work as a team," she adds. "I got terri-

bly frustrated. I still have to remind myself constantly that ADHD is a disability."

Powell used dexamphetamine briefly, but disliked the way it made him feel agitated. These days, he manages his symptoms unaided. He suffers extreme anxiety when faced with any sort of visual chaos, such as a messy office. "The house

was just painted inside. I'm still recovering from that," he confides. Conversation with him becomes fragmented as his speech speeds up, accelerating to the point where he's no longer finishing sentences. He then stops speaking for a minute, briefly closing his eyes. "I'm now using a favourite technique of mine – stretching time," he explains afterwards. "So you can talk slower, you modulate your language and by stretching time you can sound normal in short bursts."

**D**EVELOPING HER OWN COPING TECHNIQUES while still a child became second nature to Ann\*, a 47-year-old mother of three who runs her own company and was diagnosed three years ago. "I ran my life at 100 miles an hour. Still do," she says.

"Working, being a wife and mother, playing lots of sport, doing lots of volunteering. My husband tells me to slow down, to drop one of my activities. To go on holiday and sit on an island and read a book – I just couldn't cope with that. And I've been like this since day one."

She takes Ritalin every day, but believes in combining medication with behavioural strategies. "I can fly off the handle at a moment's notice, so I have to watch myself. But the drug has helped, yes," she says. "It has tended to slow me down a bit."

The oldest person I meet, Edward\*, is 68. He received his diagnosis just seven years ago. We talk first on the phone – where he describes his colossal struggles with schoolwork as a child, about enduring the anger of his father and teachers and of being ridiculed for his slowness in front of the class. "I had so much guilt and shame and that was very debilitating," he says.

Edward turns out to be a gentle, witty soul in person, although his story, too, can be hard to follow as he sometimes talks out of sequence, becoming teary with frustration when I ask him to repeat some of what he tells me. Apart from a six-year stint during which he ran his own restaurant and cocktail bar on the NSW North Coast, he has been unable to hold down a regular job; he hasn't worked since 1989. Nor has he ever married. But what haunts him more is not hav-



ing gone to university: his ambition had always been to become a pharmacist, like his father.

He has never given up trying to prove himself, and recently started studying to become a mental health worker. He used to take Ritalin, is currently on dexamphetamine, and says the medication is helping him stay focused on his studies.

I'm curious to know how the drugs affect him.

"Oh," he says, "it's nicer to think. It's not so much of a struggle. It's like putting on a shoe with a shoehorn."

It's good to hear him laugh. **GW**

\* Names have been changed. Pictures posed by model.

## Mind and matter

So what *does* go on inside the heads of people with ADHD? The reigning theory revolves around two neurotransmitters (chemicals in the brain that allow neurons, or nerves, to communicate with each other) – norepinephrine and dopamine.

Both norepinephrine and dopamine (sometimes called the "feelgood" chemical, because it's associated with motivation and pleasure) are the triggers for communication along the pathways between the basal ganglia, deep in the brain, and the prefrontal cortex, sometimes referred to as the brain's

command centre because it controls executive functions such as problem-solving, attention and reasoning. It's believed (though it's hard to find strong evidence) that ADHD results from function reduction in dopamine and/or norepinephrine levels in the brain.

The stimulant drugs used to treat ADHD in Australia are methylphenidate (Ritalin) and dexamphetamine. Medicos think that the stimulants probably act to increase levels of these neurotransmitters in various brain regions, although the effects vary from one area of the brain to another.

There has long been debate about the use of stimulant drugs to treat ADHD, whether in

adults or children, and it continues to foment. A big concern is that someone prescribed potentially addictive, amphetamine-based drugs could start abusing illicit drugs. For Sydney neuropsychiatrist Dr Julian Trollor, this fear is groundless. "There's good evidence that the outcome is far better and the rates of substance abuse lower in those treated with medication, compared with those untreated," he says.

"It's now recognised by most major research groups that treatment leads to fewer problems later in life – reduction in substance abuse rates, better psychological outcomes, better social functioning." (There are alternatives to

stimulant drugs for those who already have a history of drug abuse, which are basically antidepressants with a stimulant effect.)

Trollor is, however, less sanguine about prescribing stimulant drugs to middle-aged and older people. "Since most of the literature refers to applications in children, the long-term implications for adults are unclear," he says. "One of my concerns is that as people age, they accumulate other disorders. They may have some narrowing of coronary arteries, or they may be predisposed to other conditions like hypertension, potentially increasing the risk of side effects from using stimulant medications."