

THE TRANSPORTERS

PROFESSIONAL



Sally



Jennie



Barney



William

Helping children to recognize emotions

The Transporters are eight lovable cartoon vehicles with real human faces. Join them on their adventures around Hillside Junction and explore the world of emotions.

The Transporters is designed to help children understand and recognize emotions. It will be especially useful for children who find it hard to recognize facial expressions of emotion.

- 15 key emotions shown in context.
- Quizzes reinforce and test understanding.
- 36-page booklet explains how to get the most out of *The Transporters* at home and at school.



Oliver



Dan



Nigel



Charlie

THE TRANSPORTERS™

PROFESSIONAL

Helping children to recognize emotions



Contents

- 4 Introduction
- 6 Making the most of the DVD
- 7 About *The Transporters*
- 8 *The Transporters* characters
- 10 Episodes and themes
- 24 Activity suggestions for teachers and parents/carers
- 29 How to use the DVD
- 32 Further information
- 35 Changing Media Development

Warning: © Crown Copyright MMVI. All rights reserved. This DVD is licensed for private home use only and, where expressly authorized only, for professional use.

Welcome to *The Transporters*

Children with autism tend to avoid looking at human faces, probably because they don't understand why the features of the face move in the way they do, or that faces express the emotional or mental states felt by the person. This series of films uses mechanical vehicles with real actors' faces to encourage children with autism to look more at human faces.

The Transporters is a make-believe world of imaginary characters where vehicles have feelings! For children with autism, *The Transporters* acts as a bridge between the mechanical world that they can cope with and the human world of emotions that they usually turn away from.

This booklet explains how you can make the best use of the interactive DVD to help children with or without autism recognise emotions. It contains activities that build on each of the episodes.

Feedback

We welcome your feedback. Please email us with your thoughts on *The Transporters*, your experiences of using the DVD and any suggestions at feedback@thetransporters.com.

Introduction

by Professor Simon Baron-Cohen.
Director, Autism Research Centre,
Cambridge University

The Transporters was created with funding from the UK government and developed with a team of film and technology experts, along with scientists from my own group at the Autism Research Centre. It's the first time that I've seen high-quality broadcast animation techniques used to produce a series specifically for children on the autistic spectrum.

Tailor-made for children with autism

The Transporters has been created especially for children with autism spectrum conditions (classic autism or Asperger Syndrome) who find it hard to recognize facial expressions of emotion. Such children also have difficulty understanding the causes of emotions. Our aim is to help children (including those without autism) to enhance their understanding of the causes of emotions and of emotional expressions.

How *The Transporters* appeals to the autistic mind

We know that children with autism tend to love vehicles, probably because they are not alive and



Jamie playing with *The Transporters*

therefore move predictably. What they seem to dislike are objects that move when they don't expect them to, and for no apparent reason.

In the world of vehicles, some forms of transport are more predictable than others. For example, cars, planes and space rockets can move in almost any direction, at the whim of the driver. In that sense, cars and planes are almost as difficult as people – they are hard to predict.

Other kinds of vehicles are much more controlled in their movements. Trams have to go in straight lines because they are attached to tracks and overhead cables. So do cable cars and trains. If you think about it, such vehicles can only go forward and backward or along the gentle curve of a track. These are the vehicles most loved by children with autism.

The idea behind *The Transporters* is to help children to learn about emotions in a way that they will enjoy. For a child who doesn't naturally want to look at faces or people

(because they move unpredictably), here's a world in which the only human faces that appear are 'grafted' on to predictable, attractive vehicles. Suddenly, real people's faces are interesting to the child who will therefore find it easier to learn to understand the expressions on these faces.

The evidence that *The Transporters* actually works

The Transporters took years to make, with careful testing with children along the way. Feedback from parents and carers told us that children enjoyed this unique combination of real human faces on animated vehicles but we needed proper evidence.

A team of clinical scientists including myself and Dr Ofer Golan studied a group of children with autism and Asperger Syndrome. We encouraged them to use the DVD for 15 minutes a day at home, over a one month period. At the beginning of the project, we tested the children to see how well they could recognize emotions from facial expressions, and then re-tested them one month later. The results were remarkable.

As a group, these children showed significant improvement in their ability to recognize emotions, compared to their own previous levels. They also improved on tests of facial expressions of emotion that they had never seen before,

and even on tests using photos with a very different format from *The Transporters*, suggesting that they were able to generalize from what they had learned. We did not see these changes in an equivalent group of children with autism and Asperger Syndrome who had not had the benefit of watching *The Transporters* for the one month period.

What we found most exciting was that whilst the children with autism or Asperger Syndrome were below average at recognizing emotions at the start of the project, following the one month of learning from *The Transporters* they had caught up to the levels expected of typically developing children of the same age.

The important conclusion is that emotion recognition difficulties found in autism are not insurmountable, and that *The Transporters* is a scientifically evaluated method that can lead to significant improvement.

Finally, I'm delighted that profit from this DVD will further autism research (details on the inside back cover of this booklet).

**Simon
Baron-Cohen**



“Joyful, sad, angry, afraid...children with autism and Asperger Syndrome can often find it hard to know how another person is feeling from the look on their face. The Transporters DVD, developed with the Autism Research Centre at Cambridge University, will help children on the autism spectrum recognize and understand emotions. Combining animated mechanical vehicles with real human faces, the DVD is captivating and fun. Also, we are delighted that profit from The Transporters will go toward supporting autism research.”

Alison Tepper Singer,
Executive Vice President, Autism Speaks

Making the most of the DVD

The fifteen main emotions featured in *The Transporters* are: happy, sad, angry, afraid, excited, disgusted, surprised, tired, unfriendly, kind, sorry, proud, jealous, joking and ashamed. Additional emotions include worried and embarrassed.

Don't be concerned if your child is not familiar with all (or even any) of these emotions. The development of emotional understanding starts in infancy and continues throughout a child's life. Most children can recognize the emotions covered in this series by age nine, but emotional understanding starts by being exposed to the relevant emotion. Some children are delayed in recognizing

emotions, and *The Transporters* aims to accelerate understanding through entertainment and simple repetition.

The DVD is organized so that episodes featuring more basic emotions, understood by younger children, appear first. These are followed by episodes featuring more complex emotions.

Throughout the series, whenever an emotion is presented, the narrator names it: for instance “Dan was *happy*.” On the screen the child is shown a close-up of the facial expression, and the cause of this emotion is explained in clear, uncomplicated language: “Dan was very *happy* that he had made Sally laugh.”

Educational aims

The series aims to be entertaining, though it has clear educational goals. These include:

- 1. To familiarize children with the human face, and increase the time they spend observing faces.**
- 2. To introduce emotional concepts to children.**
- 3. To show the context of emotions (their causes and consequences).**
- 4. To show how different characters react differently to the same situation.**



An example of a close-up facial expression

About The Transporters

There are eight characters in the series, all toy vehicles with their own personalities and function. They are part of a toy set in a child's bedroom; an environment that is designed to be predictable (since children with autism love predictability) but not distracting.

The characters come to life when their owner, Jamie, leaves for school in the morning. In the series, human figures are shown as static plastic toys in a deliberate attempt to keep human action simple and to avoid the type of movement (animacy) from which children with autism turn away.

A narrator helps children to focus on the facial expressions, rather than watching the characters talking.

The toy set has four key locations: Hillside Junction, where the characters can all meet; the harbor, which most of

the characters can visit; the Observatory, a popular destination for a picnic; and the quarry.

Storylines are simple, with clear and uncomplicated language and obvious references to the emotions being expressed.

Each episode of *The Transporters* focuses on one key emotion, which is presented in different contexts throughout the story. This central emotion is expressed by more than one character, to allow children to explore the expressions on different faces.

Additional emotions appear in each episode to form the context for the key emotion. For example, the episode dealing with *fear* has characters *worrying* about the dangerous situation that is making one of the characters feel *afraid*.

The Transporters characters

WILLIAM: CHAIN FERRY

William takes other Transporters from the junction to the harbor on the other side of the estuary. He is solid and dependable.



NIGEL: COACH

Nigel carries passengers to a variety of places. He is impatient and loves traveling at a breakneck speed. Although he is always happy to help his friends, Nigel is sometimes careless and is also something of a show-off.



CHARLIE: TRAM

Charlie is a fun-loving tram. He loves helping others even if it involves overcoming his fear of heights.



JENNIE: TRAM

Jennie is usually a very caring tram but on occasion she can be a little boastful. She is very punctual and, despite being a tram, she loves traffic signals.



SALLY: CABLE CAR

Sally is one of the youngest of the Transporters. She loves taking passengers up to the Observatory, especially if there is a picnic involved.



DAN: CABLE CAR

Dan has the distinction of being the youngest Transporter. He is very mischievous and likes making up rhymes and playing tricks on the other Transporters.

OLIVER: FUNICULAR RAILWAY

Oliver takes passengers up the hill to the Observatory. He is usually grumpy but can occasionally show a sense of humor.



BARNEY: TRACTOR

Barney is the oldest of the Transporters and he often explains things to the younger ones. Despite being very slow, he can be relied on to take goods and cargo to the harbor and quarry.

GRAB: VERSATILE MULTI-FUNCTION TOOL

Barney, Charlie and Nigel can all use Grab when an important repair is needed or heavy moving is required.



Episodes and themes

Episode 1: The Transporters' Happy Day

Most of the Transporters are happy because they are doing things they really enjoy. Sally is carrying passengers, Dan is making William laugh, Barney is working at the quarry, Nigel is traveling very fast, William is taking Charlie across the harbor and Oliver is oiling his rail. But Jennie is sad because one of her wheels has buckled and she is stuck. The other Transporters rescue her, making them all very happy.

Key emotion: happy.

Additional emotions: sad, surprised.

Themes:

- Happiness is caused by getting

something we want or by doing something we like:

Ask the child: *What do you like to do? How does it make you feel? What would you like to have? How would it make you feel? How do you know you feel happy? How can other people tell you're happy?*

- Different people enjoy different things and want different things to make them happy:

Ask the child: *What does your brother/sister/parent/friend like to do? What would he or she like to have? How would that make him or her feel? Does he or she like/want the same things as you?*

Episode 2: Sally's Sad Day

Sally is very happy because she's taking the schoolchildren to the Observatory, where a photographer is going to take a picture. Dan is sad, because he cannot join in.

On her way, Sally gets splattered with mud, making her sad because she will be dirty in the photograph. Sally is even sadder when she is told that the trip has been canceled because there is

a broken rail on the viewing platform at the Observatory. But then she discovers the trip has been changed to a picnic on top of the hill. This makes Sally happy. Dan is also happy, because now he can come with Sally and the children. When they get to the picnic area, the photographer is kind and makes sure Sally's muddy door can't be seen. This makes Sally happy.

Key emotion: sad.

Additional emotions: happy, sorry, surprised.

Themes

- Sadness is caused when we lose, or when we don't get something that we really want, or when we find that we can't do something that we would like to do:

Episode 3: Nigel's Slow Day

Nigel likes speeding, but he has to travel slowly aboard the chain ferry, which makes him angry with William. He has to be rerouted because Jennie has broken down on the railroad crossing, and then Nigel ends up stuck behind Barney. He shouts and hoots at Barney, and makes Barney angry with him. Barney explains that Nigel will have to be patient, but Nigel is very angry because he can't bear to go slowly. He grumbles but finds that going slowly isn't so bad after all, since he notices things around him that he usually misses. Still, he can't wait to go fast again!

Key emotion: angry.

Additional emotions: excited, happy.

Themes

- We get angry with people when they do something we don't like and we think it is intentional:

Ask the child: *How did Sally's feelings change when different things happened to her? How did she help herself to feel better? How did her friends help her to feel better?*

Ask the child: *What do you like to do? How do you feel when you can't do it? What do you like to have? How do you feel when it is lost/broken/finished? How do you know you feel sad? How can other people tell you're sad? What makes you feel better?*

Ask the child: *Why did Nigel get angry with William? Did William choose to go slowly?*

Ask the child: *Why did William get angry with Nigel? Why is it important to say "Thank you"?*

Ask the child: *What makes you angry? Who have you been angry with? What for? Why did they do this? Was it intentional? How do you know you are angry? How could other people know? What makes you feel better?*

- Changing the way we usually do things makes us learn and experience new and interesting things:

Ask the child: *What happened to Nigel when he had to drive slowly behind Barney? Discuss how hard it is to do something differently than usual. Discuss how this makes you learn and enjoy new things. Use examples from the child's experience.*

Episode 4: Charlie Saves the Day

Sally is afraid when she is stranded above the viaduct with a storm coming. William sees that Sally is swaying in the wind and calls for help. Her only chance of rescue is Charlie, but he will have to cross the viaduct, and he is afraid of heights. Charlie makes his way slowly across the viaduct, fighting his fear all the way. He reaches Sally, and fixes her clamp back on the cable so that she can get back to the junction safely just as the storm breaks. Charlie is a hero!

Key emotion: afraid.

Additional emotions: happy, proud, worried.

Themes:

- We become afraid when something bad happens, or when we think something bad is going to happen very soon. Fear makes us want to run and hide:

Ask the child: What was Sally afraid of? Was it dangerous/bad? What was Charlie afraid of? Was it dangerous/bad?

Ask the child: What are you afraid of? How do you know you're afraid? How can others tell you're afraid? What makes you feel better?

What parents and teachers say about The Transporters

"Fantastic. My older ASD boy loves it and seems to get the point of it. He is really watching people's expressions and even commenting on them."

- Fear stops us doing things. Overcoming our fear means we can enjoy new experiences:

Ask the child: What did Charlie have to do to help Sally? How did he overcome his fear? How did he feel when he overcame his fear of heights?

Ask the child: Have you ever overcome your fears to do something? How did you do it? How did you feel when you overcame your fear?

- The importance of helping others:

Ask the child: What did William do when he saw Sally swaying in the wind? What did Charlie do when he saw Sally was stuck and swaying in the wind? Could Sally fix things by herself? Discuss the importance of helping and asking for help from others when we can't do something ourselves.

Ask the child: Have you helped others? Have you asked for help from others? What was it about? How did helping/being helped make you feel? Discuss how helping makes you feel good about yourself, and makes others want to help you when you are in need.

Episode 5: A Very Exciting Day

All the Transporters are excited because a new clock is being built at the station, and the mayor will be visiting to start the clock. Everyone has a job to do. Barney and Charlie are excited, because they have to collect clock parts; Jennie is excited because she has to collect the mayor. But Barney gets delayed by a road blockage. Nigel comes to the rescue to clear it and Barney arrives with the clock hands, just in time. Everyone is excited to see the mayor starting the clock.

Key emotion: excited.

Additional emotions: happy, worried.

Themes

- Helping others: we feel excited when we are about to do something that we really like, or something important. Excitement can feel good but sometimes we can get over-excited, too.

Ask the child: Why was Barney excited? Why was Jennie excited? How can you tell that they are excited?

Ask the child: What makes you excited? How do you know you're excited? How can others tell you're excited? How does it feel in your body?

- Working together toward a goal gets better results:

Ask the child: Who helped to get the clock ready on time? Could Charlie bring the cogs and the hands back to the station on time on his own? Could Barney arrive on time without Nigel's help? Discuss how working together in a group gives better results.

Ask the child: Who did you work with to achieve a goal? What was your goal? Could you do it as well on your own? How did working together make you feel?

Episode 6: Jennie's Smelly Adventure



Jennie is disgusted by the smell of fish

Barney is in the paint shop and can't collect his cargo from the harbor. Jennie volunteers to help, not realizing that it is a wagon of smelly fish for the market. She is disgusted by the bad smell, but since she promised to help Barney, Jennie takes the cargo. Jennie is worried that people will think she is smelly. When Charlie arrives, he is disgusted by the

smell. Jennie is embarrassed because she thinks Charlie will think she smells, but Charlie doesn't. He kindly offers to go with Jennie. They then make their way to the market, trying to hold their breath as best they can!

Key emotion: disgusted.

Additional emotions: embarrassed, happy, worried.

Themes

- We become disgusted when we see, taste, smell or touch something bad or unpleasant:

Ask the child: Did Jennie like the smell of the fish? What did she want to

do when she smelled them?

Ask the child: What makes you disgusted? How can others know you are disgusted? What can you do to feel better? How can you tell when other people are disgusted?

- The importance of keeping promises:

Ask the child: If Jennie was disgusted by the fish, why did she take them? Why was it important that Jennie keep her promise to help Barney? How would Barney feel if Jennie hadn't kept her promise to take the cargo?

Ask the child: Has someone ever promised you something and broken the promise? How did that make you feel? Why is it important to keep promises?

be good (e.g. getting a present you didn't expect) or bad (e.g. finding that someone has eaten the chocolate you were keeping).

Ask the child: What did Barney expect his friends to do when they saw him? When they didn't do it, how did he feel? Was it a good surprise or a bad one? Did Barney expect to have a party when he got back to the junction? How did he feel? Was it a good surprise or a bad one?

Ask the child: Has something happened to you that you didn't expect? What was it? Was it a good or a bad surprise? How did it make you feel? How might others have known that you were surprised?

- Different people know different things.

Ask the child: Did the Transporters know it was Barney's birthday? Did he know that they knew? Did Barney know his friends were preparing a party for him? Discuss how not knowing about something allows others to surprise you.

- Withholding information:

Ask the child: If the Transporters knew that it was Barney's birthday, why didn't they wish him a happy birthday? Why was it important that they didn't tell him they knew? Discuss the importance of withholding information to create a surprise.

Episode 7: Barney's Special Day

It's Barney's birthday but all the other vehicles go about their business as if it's just any other day. Barney is surprised that no one has remembered. This makes him sad. But what Barney doesn't know is that his friends are preparing a surprise celebration for him when he gets back to the junction that evening



Barney returns to Hillside Junction

Key emotion: surprised.

Additional emotions: excited, happy, sad.

Note that for the sake of simplicity, disappointment was broken down to surprise followed by sadness throughout the episode. If the child you work with can understand the concept of disappointment, you can introduce it in this episode.

Themes

- We become surprised when we expect something to happen and it doesn't, or when something that we didn't expect happens. Surprise can

Episode 8: William's Scrapyard Nightmare

William is crossing the estuary, but something is wrong. Although he is usually so strong and powerful, he finds that he is losing his strength and feeling very tired. He is very worried that he is ready for the scrapyard. Barney tells William that the problem is simply a broken cogwheel in William's engine. Barney then fixes William. Fixing William makes Barney tired too, but William is very happy that he is not ready for the scrapyard.



William's broken cog makes him tired

Key emotion: tired.

Additional emotions: happy, sad, surprised, worried.

Themes

- We feel tired when we've worked hard or have done a lot without a rest.

We can also feel tired when we've been thinking or worrying about something too much, because our mind needs a rest:

Ask the child: William worked hard to get to the junction. How did it make him feel? Why was he tired? Why did he think he was tired? Why did William ask Charlie to stop singing his rhyme? Why did Charlie's rhyme tire William? How did Barney feel after working so hard to fix William?

Ask the child: What makes you tired? How do you make yourself feel better? Discuss both physical and mental tiredness.

- Telling others about our problems can help:

Ask the child: Why did William think that he was so tired? Why was William really tired? Was William really ready for the scrapyards? Who told William that he had a broken cog? How did Barney help William? Could Barney have helped William if William hadn't told him he had a problem?

Ask the child: Who do you talk to when you have a problem? What do they do when you tell them about your problem? How can telling other people help you deal with your problems better?

other person has upset us, and sometimes it's because something else is bothering us:

Ask the child: How did Charlie answer William's greeting? Was he angry with William? Did William do something bad to him? Why was Charlie unfriendly to William? Why was Sally unfriendly to Charlie? Did Charlie do something bad to her?

Ask the child: What puts you in an unfriendly mood? Is it always something that the person you're being unfriendly to has done?

- Different people react differently to the same situation:

Ask the child: How did William feel when Charlie was unfriendly to him? Why was he surprised? How did Sally feel when Charlie was unfriendly to her? Why was she sad?

Ask the child: How would you feel if someone was unfriendly to you? Does it matter who it is? Would you feel differently if it was a parent, a brother or a sister, another child, or a teacher?

- Restoring friendship:

Ask the child: What did Charlie do to become friends with Jennie again? What did he do to become friends with Sally again? Why is it important to apologize? How does it make the other person feel? Have you ever upset someone by being unfriendly? How did you make sure you were friends again?

- Telling other people about your problems can help:

Ask the child: What did the Transporters suggest that Charlie do next time he feels bad? How could telling others help him? Who do you tell when you feel bad? How do they help you then?

Episode 9: Charlie's Missed School Run



Charlie's unfriendliness upsets Jennie

Charlie is looking forward to doing his favorite trip, taking the students to school, only to find that Jennie has already done it, which leaves him with a bad feeling. He snaps at the other Transporters, who wonder why he is being so unfriendly. Charlie's unfriendliness hurts Sally's feelings. Jennie gets to the root of the problem and explains to Charlie that she

thought it was her turn to do the school run and she hadn't meant to upset him. To make amends she offers to let Charlie do her school run the next day. Charlie greets Sally, who is being unfriendly to him because he hurt her feelings earlier. Charlie apologizes for being unfriendly to everyone.

Key emotion: unfriendly.

Additional emotions: happy, sad, sorry, surprised.

Themes

- When we're being unfriendly to someone we are not nice, and we can even be nasty to them. Sometimes we can be unfriendly because the

- Different reactions to intentional and unintentional actions:

Ask the child: Why was Charlie unfriendly to Jennie? Did he think that Jennie meant to take his school run? Why did Jennie take Charlie's school run? How did Charlie feel when he learned that Jennie did not mean to take his school run? Discuss how Charlie's belief about the situation made him feel, and react to others in a certain way.

Ask the child: Have you ever thought that someone had done something to you intentionally but it turned out to be a mistake? How did you feel when you thought it was intentional? How did you feel when you learned it was a mistake?

What parents and teachers say about The Transporters

"I have been showing the DVD to some of the children and they are enjoying the series. After the sessions they are expressing some of the emotions. During the day, if I pass the children they make a face and name the emotion."

Episode 10: Oliver the Kind Funicular

Oliver is sad because he can't travel up to the Observatory while a new window is being fitted. Sally kindly waits with him to keep him company. When the window has been fitted she leaves Oliver to get back to work.

Later, a very tired Sally realizes that she still has to make one more trip to the Observatory. The usually grumpy Oliver remembers how nice it felt when Sally was kind to him earlier.

He kindly offers to take her passengers and let her rest, glad that he can return Sally's friendship. However, he still wouldn't like to be called "Oliver the kind funicular"!

Key emotion: kind.

Additional emotions: happy, sad, surprised, unfriendly, tired, grumpy.

Themes

- When we're being kind to people, we are nice and friendly to them. We want to listen to what they say and help them if they need help:

Ask the child: How was Oliver feeling? Why was he sad? Was Sally kind to Oliver? What did she do? When Sally was tired, why was Oliver kind to Sally? What did he do to show his kindness? Discuss how being kind to someone might make them want to reciprocate, and how kindness can take the form of physical help or emotional support.

Ask the child: When you're feeling bad, who is kind to you? What do they do? How does it make you feel when they are kind? What do you do when you see that your parent/brother/sister/friend is sad or worried? Is that a kind thing to do? Why are you being kind to them? How does it make them feel?

- Noticing other people's mood:

Ask the child: How did Jennie think Oliver was feeling? How did Sally think Oliver was feeling? Who was right? How could they tell how Oliver was feeling? Discuss the importance of looking at someone's face, listening to them and asking them questions, in order to understand and learn how they're feeling.

Ask the child: Can you tell when your parent/brother/sister/friend is feeling sad? How do you know that they are sad?



Oliver cheers up because Sally is kind to him

Episode 11: Slow Down Nigel!

A rock is blocking Jennie and Barney's path. Before they can stop him, Nigel drives into the rock to help them by pushing it out of the way. But the rock flies through the air and smashes a window! Nigel is very sorry. After being angry with Nigel for his carelessness, Barney is sorry, because he realizes Nigel only wanted to help. Nigel then speeds off on his way, to be told to slow down by everyone he meets. He doesn't, and crashes into Charlie, knocking him off his track. Nigel is very sorry and fixes Charlie back on the track. He says sorry to everyone, until eventually he has to say sorry for saying sorry so many times!

Key emotion: sorry.

Additional emotions: angry, excited, kind, proud, sad, surprised, worried.

Themes

- We feel sorry when we find out that something we have done turns out badly in a way we didn't intend:

Ask the child: What happened when Nigel hit the rock? Did Nigel mean to break the window? How did he feel when it happened? Did Nigel mean to bump into Charlie? How did he feel when it happened?

Ask the child: What have you done that you didn't mean to turn out badly? How did it make you feel? How did other people feel about it? What have you done to make it better?

- The importance of listening to others:

Ask the child: Did Nigel listen when Jennie and Barney said he shouldn't push the rock out of the way? What did he do? How did it turn out? How did Nigel feel? Why was Oliver angry with Nigel? Did Nigel listen to William and Sally when they told him to slow down? How did it turn out? How did he feel? Discuss the importance of listening and discussing things with others rather than doing things on your own.

Ask the child: Do you listen to others before doing something you haven't done before? Who do you listen to? Does it help to listen to others? Have you ever been sorry for not listening to others?

- Apologizing and making amends:

Ask the child: What did Nigel say when he saw the damage he had done? How did Nigel's apology make his friends feel? Did Nigel's apologies help Charlie after he'd been derailed? What did Nigel do to help Charlie? Discuss the importance of apologizing. Stress that apologies are sometimes not enough and that, if this is the case, action may be needed to put things right.

Ask the child: Have you ever done something you're sorry for? What did you say and do to make things better? How did apologizing make you feel? How did it make the other people feel?

Episode 12: The Great Race

Nigel is very proud of being the fastest of the Transporters and challenges the others to a race. Only William is willing to race, which surprises everyone. Surely Nigel will win easily! They begin the race, but Nigel stops to chat, boasting that he is fast enough to stop for a break and still beat William. But he stops for too long and William beats him, making it William's turn to be proud.

Key emotion: proud.

Additional emotions: sad, surprised, worried.

Themes

- We are proud when we feel that we are good at something or have done something very well:

Ask the child: Who did Nigel think was the fastest? Did Nigel like being the fastest? How could we tell that from his face? Who won the race? Did William like winning the race? How did he feel at the end? What was the special thing he had done that made him proud? How could we tell that from his face?

Ask the child: How does it feel when you do something very well? How can other people tell that you are proud of what you did?

- Being too proud

Ask the child: Why did Nigel want to race the other Transporters? Didn't

he already know he was the fastest? What did Nigel do when William wanted to race him? Why did he laugh at William? Was it a nice thing to do? Why did Nigel stop to chat to the others during the race? Did he think it would make him lose? Why did Nigel lose the race? How did he feel then?

Ask the child: What are you good at? Do you like telling others how good you are? How might they feel about it? Discuss how being proud of something you are good at is different from bragging (being "too proud") and making fun of others who may not be as good at it.

- The importance of staying on task:

Ask the child: How did William win the race? Did he stop on the way to chat like Nigel? Why did Nigel lose, even though he was faster? Discuss how staying on task made William win the race, while stopping to chat and not staying on task made Nigel lose.

Ask the child: Are you good at sticking to something you are doing? Does that make you do things better?



Nigel reaches the harbor moments after William and loses the race

Episode 13: Why Can't I Be Someone Else?

Oliver is jealous of all the other Transporters. Nigel goes so fast, while all Oliver does is go slowly up and down the hill. Sally has Dan to keep her company and Jennie gets to stop at traffic signals. The other Transporters try to show Oliver the positive side, though Oliver soon finds something else to be jealous about. But when there is a power outage at the substation on the hill, only Oliver can reach it. He has to fix it to get the traffic signals working again, before there is an accident. Oliver realizes that what he does is very important and he doesn't feel jealous any more. But now Nigel is jealous of Oliver, who can fix the substation!

Key emotion: jealous.

Additional emotions: happy, kind, proud, worried, grumpy.

Themes

- We feel jealous when someone else has, or can do, something we really want:

Ask the child: What can Nigel do that Oliver can't? What did Sally and Dan have that Oliver didn't? What can Jennie do that Oliver can't? What did Oliver want? How could you tell from his face that Oliver was jealous of his friends?

Ask the child: Do you sometimes want things that other people have, or to be able to do something as well as they do (do you sometimes feel

jealous of others)? Is that a good or a bad feeling? What do you do to feel better?

- Everyone has their strengths and weaknesses:

Ask the child: What was Oliver good at? How did he save the others from an accident? Could the other Transporters have fixed the substation? Discuss how each of the Transporters has his or her own strengths. Get examples of individual strengths from the child.

Ask the child: What are you good at? Are there things you can do, or you have, that others can't do or don't have? Are there things that others (e.g. a brother, sister, friend etc) can do or have that you can't or don't? What are they?

- Focusing on what we do have can help us deal with jealousy:

Ask the child: What did Sally and Jennie do to help Oliver when he felt jealous? How did Oliver feel when Sally told him that his passengers like him to go slowly? How did Oliver feel when Jennie told him that he can talk to her on the radio at any time? Did what Jennie said help Oliver feel less jealous?

Ask the child: How can you help yourself feel better when you get jealous? How can you help others feel better when you see that they're jealous?

Episode 14: Playing Around

Dan decides to kid around to make everyone laugh. He makes Sally, Barney and Jennie laugh, but also manages to make Oliver jump. This causes him to set off down the track without his passengers.

Oliver is angry with Dan, who feels sorry when he realizes what he's done. He apologizes and explains that he meant to make Oliver laugh, not to make him angry. Oliver is no longer angry and makes a funny face to make Dan laugh.

Key emotion: joking (playing around).

Additional emotions: angry, excited, happy, sorry, surprised, tired, grumpy.

Themes

- We kid around when we feel good and want to make other people laugh and be happy too:

Ask the child: Why did Dan make a funny face at Sally? Why did he make up the rhyme for Jennie and Barney? How did it make them feel? How could Dan tell that Sally, Jennie and Barney enjoyed it when he was playing around?

Ask the child: Do you ever feel that you'd like to make other people happy or laugh? What do you do to make people laugh? Are there other ways apart from making faces? How can you tell that people are enjoying your playing around?

- Reaction depends on personality and mood:

Ask the child: Did Sally, Jennie and Barney enjoy Dan's playing around? Did Oliver enjoy Dan's playing around? How could you tell that he didn't? Why didn't Oliver enjoy it? Discuss how different people may react differently to jokes and pranks, depending on their personality and the situation.

When you try to make people laugh, does it work with all of them? Why? Are there people who enjoy certain kinds of jokes more than others? How can you tell if they enjoy your jokes?

- Apologizing and making amends:

Ask the child: What happened to Oliver when Dan shouted "Boo"? How did that make Oliver feel? Did Dan want to make Oliver angry? How did Dan feel when he saw that Oliver was angry? What did he do to make Oliver feel better? How could Oliver know that Dan was sorry? What did he do to show that he wasn't angry any more? Discuss the importance of apologizing and explaining our motives to restore friendship.

Ask the child: Have you ever tried to joke with someone who didn't think it was funny, or was offended? What did you do to make them feel better? Have other children ever offended you by playing around? How could you make yourself feel better?

Episode 15: Jennie's Difficult Day

Barney is late picking up his cargo. Jennie tells him that he is always late, whereas she is never late. Barney is ashamed about being late. But later that day Jennie realizes that she is late herself. She goes off to the quarry to hide, ashamed of being late and of the way she spoke to Barney. The other vehicles become worried about her and form a search party. They eventually find her at the quarry, feeling ashamed. They tell Jennie there's nothing to be ashamed about at all, because she wasn't running late – the church clock is running ten minutes fast!

Key emotion: ashamed.

Additional emotions: happy, sad, sorry, surprised, worried.

Themes

- We feel ashamed when we have done something bad that we don't want others to know about:

Ask the child: Did Barney enjoy being late? How did he feel when Jennie told him that he's always late? What did Jennie think when she saw the church clock? How did being late make Jennie feel after she had told Barney that she's never late?

Ask the child: Have you ever felt ashamed about something you have done? Has anyone ever said something to you that made you feel ashamed? How might others know

you are ashamed? What could make you feel better?

- Going away without telling anyone:

Ask the child: Where did Jennie go when she saw that she was late? Why did she go to the quarry? Did she tell the other Transporters where she was going? Why didn't she tell them? How did the others feel when they couldn't find Jennie?

Ask the child: Have you ever gone somewhere without telling other people where you were? Did you like it there? How did your parents or teachers feel when they didn't know where you were? How might you have made them less worried? Discuss the importance of telling parents or teachers where you are going, to prevent them from worrying.

- Hurting others:

Ask the child: How did Barney feel when Jennie told him that he's always late, while she is never late? Why did Jennie say that? Did she mean to upset Barney? What did she do later to make Barney feel better? How can she make sure she doesn't hurt her friends again?

Ask the child: Have you ever said something that hurt another person? How could you tell they were hurt by what you had said? What could you do to make them feel better? What can you do to make sure you don't hurt them again?

Activity suggestions for teachers and parents/carers

Teachers and parents or carers can extend the educational potential of *The Transporters* through a variety of activities dealing specifically with emotions. Here are some ideas from which to develop lesson plans and activities using *The Transporters* that will reinforce a child's understanding of emotions, their causes and consequences, and their associated facial expressions.

Make use of repetition

Repetition is valuable. When children enjoy a movie, they may watch it over and over. With children who have autism, repetitive playing of a favorite movie may be even more common. It is important to allow the child to replay the episodes again and again, as a means of reinforcing an understanding of the emotions and social interaction.

Often, the child may prefer to replay certain parts of the episodes (e.g. where spinning wheels are shown). If this happens, try to interest the child in watching the whole episode. Help the child to focus on faces and interactions. Make the section she or he is interested in appear at the end as the reward for the child's attention to the emotional parts. You can do this by selecting her or his favorite Chapter from the Episodes menu (see p 29).

If a child favors specific episodes, possibly because they feature characters he or she likes, allow these episodes to be replayed. In parallel, encourage the

child to watch other episodes, perhaps by looking for the part their favorite character plays in them, or by searching for other characters who express similar emotions to those expressed by the favorite character.

For example, if the child likes Charlie because he saves Sally's day by using Grab in *Charlie Saves the Day*, try to encourage the child to watch other episodes in which Charlie appears, other characters who use Grab, or other characters who feel proud (the way that Charlie feels after rescuing Sally).



Charlie uses Grab to help Sally in Charlie Saves the Day

Use the episode themes

In this guide, each episode summary is followed by themes for discussion with the child. The themes include a description of the key emotion, its causes, how it feels and how it can be recognized in others. In addition, themes of social relationship that are brought up in the episode are highlighted for

discussion (for example, the importance of keeping promises, or the importance of saying "sorry").

Each theme includes two types of questions to be discussed with the child: questions about the feelings and actions of the characters in the episode, followed by questions about the feelings and experiences of the child watching the series.

Try to start discussing the themes by using the characters in the series, to avoid the child rejecting discussion of difficult themes (such as apologizing). After a child has successfully recognized the themes in the episode, ask about his or her own experience. This will get the child emotionally involved with the themes and could help with the transference of learning into everyday life.

Select episodes by emotion

Select an emotion the child can understand and look for this emotion across the different episodes and in different characters. Look for the similarities in the causes and the expression of the emotion in different characters in the different episodes.

For example, when learning about "happy", discuss how happiness is often the result of doing something you like, or of getting what you want. Try to look for examples of this in the different episodes (e.g. Sally is happy when she gets Dan's passengers because she likes chatting to passengers, and now she will have more passengers to chat with). You can use the episode themes for more ideas about the causes of emotions.

Use the quizzes

Take the episode quiz immediately after watching each episode. This will reinforce the ideas portrayed in the episode.

Take quizzes based on each emotion to assess the understanding of a specific emotion throughout the series.

Take a mix of questions at an advanced stage, to enhance the child's ability to recognize emotions beyond a specific episode.

Start on EASY-level quizzes and move to HARD-level quizzes when you feel that the child can succeed.

Make sure that when answering quiz questions, the child uses information from the facial expressions. Children who have difficulties looking at faces often use situational cues to come up with an answer (e.g. the question clip takes place in the quarry, so the correct answer will be the one that also takes place in the quarry). Explain to the child that the question and answer won't necessarily come from the same scene, so he or she needs to look at the emotion on the characters' faces to find the correct answer.

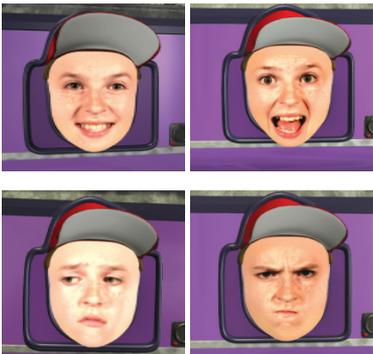
Use the vocabulary of emotions

The series could help to increase the use of emotion words in the child's speech, even when little language is used. Stress the labels of emotions when they appear in the episodes. Ask the child to

try to remember all the emotion words in an episode. Encourage the child to use these labels in his or her everyday speech. Try to use these emotion words explicitly when you speak to the child and to others.

Draw attention to facial features

Many children with autism do not show any interest in faces, and don't know where to look for social and emotional cues in the face. Associate the feelings the characters feel with the expressions on their faces. Show the child how, when something happens to the characters, their expression changes. Show the child examples from his or her everyday life (e.g. "Look at your sister's face. She is happy to see you, like Barney was happy to see Jennie").



Compare different facial expressions

Draw the child's attention to the facial regions that are most important for emotional expressions – the eyes and the mouth. Compare different facial

expressions to pinpoint the differences in the shape of the important facial features. Close-up shots of the faces showing their emotions are a strong feature of each episode. You and the child can compare them, to see how the eyes and mouth are different in the portrayal of different emotions.

Compare facial expressions of different characters expressing the same emotion and find common features in them (e.g. all the happy ones smile with their mouth and their eyes).

Look at changes in expressions

Help the child to notice changes in expression that relate to changes in the plot. Sometimes this will be stated clearly by the narrator (e.g. "Traffic signals were one of Jennie's favorite things. They always made her happy. But as Jennie approached the station her expression changed"). At other times the transition can be seen only on the character's face. Associate these transitions with the plot.

Explain how the change in the plot brought about a change in the way the character is feeling and in the way this new feeling is expressed on the character's face.

Point out the importance of eye direction

Ask where the character is looking and why. Associate where the character looks with what the character knows (e.g. "Oliver does not *look* in Dan's direction; he doesn't *know* Dan is going to shout 'Boo' at him, and he is

surprised when Dan does so").

Discuss the role of eye direction in predicting what the character wants to do next and what his or her intentions are (e.g. "Oliver is looking toward Dan and Sally when he wants to have someone to talk to"). Emphasize how gaze direction is a cue for communication with other characters – when a character wants to communicate with another, she or he looks into the other character's eyes.

Note when one character is deliberately avoiding looking at another. Mention how the character is feeling, e.g. is he avoiding looking at the other character because he is *sorry*, *ashamed* or *unfriendly*?



Eye direction can be a cue for communication with another character

Mime emotional expressions

Some children with autism use very limited facial expressions. For these, the DVD could be used to enhance the expression of emotion in their face. Select the child's favorite characters and ask the child to mimic them.

Practise expressing the emotions facially in the same way that the

characters do. Do it in front of a mirror, or film it and compare it with the expressions shown in the series. Encourage the child to think about what happens to his or her mouth, eyes, forehead, eyebrows, the angle of the head, the position of the neck and shoulders. Create role-play around emotional situations.

Discuss the causes and consequences of emotions

Emotions are confusing for children with autism partly because they find it hard to predict what causes emotions. *The Transporters* offers lots of examples of causes of emotions and their consequences. Encourage the child to analyze the causes of different emotions.

Try to focus on two kinds of causes: causes that relate to the *situation* (e.g. getting stuck on the rail makes Jennie sad), and causes that relate to a character's *beliefs*, thoughts, feelings or wishes (e.g. "Charlie *believed* that Jennie meant to take his school run. When she said it was a mistake, he was *surprised*").

Look for common features and underlying principles in the causes of the same emotion. Look at the episode themes above for some ideas (e.g. characters are excited when they are about to do something they like, or something that is special or important: "Dan is excited about making Oliver laugh"; "Jennie is *excited* about going to get the mayor").

Contrast emotions with each other to look at the differences in the context of their causes (e.g. "When something

I like is going to happen, I'm *excited*. When something I don't like is going to happen, I'm *worried*").

Observe the consequences of emotions – how expressing a certain emotion evokes a similar emotion in the other person, e.g. being kind to someone makes them happy.

Discuss what makes some characters respond to the same emotion differently. For example, why were Jennie and Barney happy with Dan's playing around, while Oliver was angry?

Discuss quick changes in emotion, and how these result from changes in the situation or in one's thoughts, wishes or beliefs. For example, when Jennie approaches Barney in *Barney's Special Day*, he is *happy* because he *thinks* she is going to wish him a happy birthday. When Jennie just collects her passengers without greeting Barney, he is *surprised*, because Jennie's behavior does not match his expectation. When Barney's belief then changes into the belief that Jennie has forgotten his birthday, this makes him *sad*. Use examples from the child's everyday life to help her or him understand the

causes and consequences of the character's emotions.

Transfer understanding from the screen to real life

Bringing the understanding of emotions from the series to the real world is a principal educational aim of the series. There are several things you can do to help with this. Look for similar emotional expressions on TV, in movies and newspapers, as well as in real life when watching other people. Talk about what happened, who the characters were, how they felt and how they showed their feelings.

Choose pictures from magazines that convey different emotions. Try to work out what the people could be thinking or saying, looking at the similarities to emotions in the series.

Associate the emotions presented in the series with the child's immediate environment. Discuss examples from their lives. Ask the child to mention such examples from his or her experience. Ask the child to create similar stories to those in the series with his or her own toys.

What parents and teachers say about *The Transporters*

"After only watching three or so episodes he [my son] knew the names of every character... he then said to me, "Look, Daddy's happy." This was the first time he'd said this. Ever."

"It's a bit like someone's flicked a switch in his head."

How to use the DVD

The DVD is designed to be easy to use and contains 15 five-minute episodes and a selection of quiz questions that can be played after each episode.

This short guide will help you to get the best from the DVD, and gives instructions on how to use it with your DVD player.

When you insert *The Transporters* DVD into your DVD player, the following screen will appear:



Main Menu

This is the main menu, which you can return to at any time simply by pressing the *Top Menu* or *Title Menu* button on your DVD remote control.

If you do nothing, the DVD will automatically default to **PLAY ALL** and play the episodes in numerical order with no quizzes and no subtitles.

The DVD is designed in this way to allow children to play it independently, without having to read a menu or press any buttons.

PLAY ALL

When you select **PLAY ALL** from the menu, using the arrow buttons and

'Enter' key on your remote control, the episodes will start. This will happen automatically after 30 seconds if you don't click any buttons. The early episodes feature more basic emotions, while the later episodes feature more complex ones.

SELECT AN EPISODE

SELECT AN EPISODE takes you to menu screens that allow you to select one of the 15 episodes. Once you've selected one of these episodes, the *Episode Menu* will be shown (see below).



Episode menu

PLAY starts the episode. At the end of the episode you return to this menu.

CHAPTERS jumps to a menu that allows you to choose one of six key sections in each episode.

EASY QUIZ or **HARD QUIZ** takes you to the quizzes relating to the specific episode you've chosen. You can also select quizzes from the *Main Menu* (see above).

BACK returns you to the *Main Menu*.

TRY THE QUIZ

This takes you to the *Quiz Menu* (see below) from which you can go to the quizzes without viewing the episodes. You can also access individual episode quizzes through the *Episode Menu* (see above).

About the quizzes

The quizzes are a fun way to reinforce a child's understanding of the emotions portrayed in the stories. They test whether a child can link a word describing an emotion, the facial expression of that emotion, and the causes of the emotion. Working with the child as they use the quiz is the most effective way of using this resource.

If a child is going to take the quiz alone it's vital that he or she can use the remote control confidently, because the DVD will pause indefinitely until an answer has been chosen.

Once you've selected a quiz, you'll be asked a question and given either two or three answers to choose from, depending on the difficulty of the quiz. To scroll to the correct answer, use the arrow buttons on the remote control.

You will also find some theme-based questions to ask in the Episodes section of this booklet (see pages 10-23). These additional questions complement the stories and quizzes and should help the child with her or his understanding of the causes of the emotions.

Quiz Menu



Quiz Menu

SELECT QUIZ BY EPISODE has quizzes with questions about different emotions in each specific episode.

SELECT QUIZ BY EMOTION has quizzes with questions relevant to a specific emotion. The questions are taken from different episodes.

TRY A MIX OF QUESTIONS has quizzes with a selection of questions about different emotions from a variety of episodes.

Difficulty level

EASY quizzes offer a choice of two possible answers per question, one correct and one incorrect. The incorrect answer is usually quite different from the correct one.

HARD quizzes have a choice of three possible answers. **HARD** quizzes actually repeat the easy quiz questions, however, they also include an additional incorrect answer that is usually closer to the correct answer.

Question types

The questions are all very simply worded to suit the young audience. The three question types are:

- **Matching faces with faces:** Match the two characters who are feeling the same (e.g. Sally is feeling happy. Who else is feeling happy?). Each episode-based quiz has two questions of this type.
- **Matching a face to an emotion:** Identify the face that shows the emotion (e.g. Who is feeling happy?). Each episode-based quiz has two questions of this type.
- **Matching situations with faces:** An emotion-provoking situation is shown with the character having a blank face. The two or three faces to choose from show different facial expressions (e.g. Sally is swaying in the wind. How is Sally feeling?). Each episode-based quiz has four questions of this type.

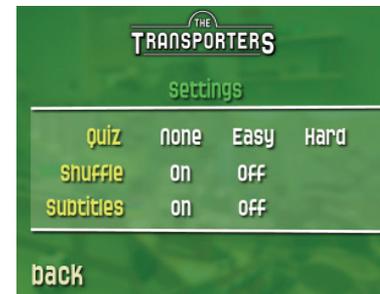
There are a maximum of eight questions per quiz.

Rewards

When a question is answered correctly, the child is congratulated by the narrator and a reward appears – an animation of Barney's wheels, William's cogs or the waterwheel turning.

If the question is answered incorrectly the question is asked again until the viewer answers correctly. When the correct answer is given, the reward appears.

Settings



Settings menu

Shuffle and Subtitles can be used to alter the way that **PLAY ALL** operates.

QUIZ EASY/HARD selects whether an episode-based quiz will be shown after each episode automatically, and whether it's easy or hard. If you select the quiz option it is essential that the child can operate the DVD remote control.

By default the **QUIZ** is set to **NONE**, so no quiz will be seen between the episodes.

SHUFFLE OFF/ON selects whether the episodes play in a random order. By default **SHUFFLE** is set to **OFF**.

SUBTITLES OFF/ON selects whether subtitles showing exactly the same words as the narrative are shown on screen. By default **SUBTITLES** are set to **OFF**.

ABOUT

The **ABOUT** option shows you some of the people and organizations who were involved in bringing this DVD to your screen.

Further Information –

Note: journal articles by Baron-Cohen and by Golan are available to download from: www.autismresearchcentre.com

Autism spectrum conditions - General

Books

Frith, U. (2003). *Autism: Explaining the Enigma* (2nd ed.). Blackwell Pub.: New York.

Attwood, T. (1998). *Asperger's Syndrome: A Guide for Parents and Professionals*. London: Jessica Kingsley.

Emotions and their development - General

Books

Denham, S. A. (1998). *Emotional Development in Young Children*. New York; London: Guilford Press.

Harris, P. L. (1989). *Children and Emotion: The Development of Psychological Understanding*. Oxford: Blackwell.

LeDoux, J. E. (1998). *The Emotional Brain: The Mysterious Underpinnings of Emotional Life*. London: Phoenix.

Journal articles

Dunn, J. & Hughes, C. (1998). "Young Children's Understanding of Emotions within Close Relationships." *Cognition and Emotion*, 12(2), 171-190.

Gross, A. L. & Ballif, B. (1991). "Children's Understanding of Emotion from Facial Expressions and Situations: A review." *Developmental Review*, 11(4), 368-398.

Herba, C. & Phillips, M. (2004). "Annotation: Development of Facial Expression Recognition from Childhood to Adolescence: Behavioural and Neurological Perspectives." *Journal of Child Psychology and Psychiatry*, 45(7), 1185-1198.

Interventions into emotions and socializing in autism spectrum conditions

Software and books

Baron-Cohen, S., Golan, O., Wheelwright, S. & Hill, J. J. (2004). *Mind Reading: The Interactive Guide to Emotions*. London: Jessica Kingsley Limited www.jkp.com

Howlin, P., Baron-Cohen, S., & Hadwin, J. (1999). *Teaching Children with Autism to Mind-Read : A Practical Guide for Teachers and Parents*. Chichester: B. J. Wiley.

Book Chapters

Golan, O., LaCava, P. G. & Baron-Cohen, S. (2007). "Assistive Technology as an Aid in Reducing Social Impairments in Autism Spectrum Conditions." In R. L. Gabriels & D. E. Hill (Eds.) *Autism: Beyond Early Interventions*. Guilford Press.

Journal articles

Attwood, T. (2000). "Strategies for Improving the Social Integration of Children with Asperger Syndrome." *Autism*, 4(1), 85-100.

Baron-Cohen, S., Hill, J. J., Golan, O. & Wheelwright, S. (2003). "Electronic Emotions: Encyclopaedic." *Autism Digest*, 14-19.

Golan, O. & Baron-Cohen, S. (2006). "Systemizing empathy: Teaching Adults with Asperger Syndrome and high functioning autism to recognise complex emotions using interactive multimedia." *Development and Psychopathology*, 18(2), 591-617.

Hadwin, J., Baron-Cohen, S., Howlin, P. & Hill, K. (1996). "Can we teach children with autism to understand emotions, belief or pretence?" *Development and Psychopathology*, 8(2), 345-365.

Rogers, S. J. (2000). "Interventions that facilitate socialisation in children with autism." *Journal of Autism and Developmental Disorders*, 30(5), 399-409.

Emotions in autism

Book Chapters

Kasari, C., Chamberlain, B. & Bauminger, N. (2001). "Social emotions and social relationships: Can children with autism compensate?" In J. A. Burack, T. Charman, N. Yirmiya & P. R. Zelazo (Eds.), *The Development of*

Autism: Perspectives from Theory and Research (pp. 309-323). Mahwah, NJ, US: Lawrence Erlbaum.

Journal articles

Baron-Cohen, S. (1991). "Do people with autism understand what causes emotion?" *Child Development*, 62(2), 385-395.

Baron-Cohen, S., Spitz, A. & Cross, P. (1993). "Can children with autism recognize surprise?" *Cognition and Emotion*, 7, 507-516.

Bormann-Kischkel, C., Vilsmeier, M. & Baude, B. (1995). "The development of emotional concepts in autism." *Journal of Child Psychology and Psychiatry*, 36, 1243-1259.

Capps, L., Yirmiya, N. & Sigman, M. (1992). "Understanding of simple and complex emotions in non-retarded children with autism." *Journal of Child Psychology and Psychiatry*, 33, 1169-1182.

Fein, D., Lucci, D., Braverman, M. & Waterhouse, L. (1992). "Comprehension of affect in context in children with pervasive developmental disorders." *Journal of Child Psychology and Psychiatry*, 33(7), 1157-1167.

Yirmiya, N., Sigman, M. D., Kasari, C. & Mundy, P. (1992). "Empathy and cognition in high-functioning children with autism." *Child Development*, 63, 150-160.

Recommended websites

Autism Society of America
www.autism-society.org

Autism Society Canada
www.autismsocietycanada.ca

Autism Speaks
www.autismspeaks.org

The MIND Institute
www.ucdmc.ucdavis.edu/MINDInstitute

The Autism Research Centre, University of Cambridge
www.autismresearchcentre.com

Books and resources on emotions for individuals with autism spectrum conditions: www.tonyattwood.com.au

The Transporters official website:
www.thetransporters.com

Feedback

We welcome your feedback. Please email us with your thoughts on *The Transporters*, your experiences of using the DVD and this booklet, or any suggestions. Our email address is **feedback@thetransporters.com**.

Commissioned by UK Government

Developed with the ARC
University of Cambridge
www.autismresearchcentre.com

Scientific Consultants: Professor
Simon Baron-Cohen, Dr Ofer Golan



Changing Media
DEVELOPMENT

Changing Media Development Ltd. Registered office 52 Great Eastern St, London EC2A 3EP
Registered England & Wales Company No. 6386085

Changing Media Development Ltd

We are dedicated to the creation and distribution of products to help children with autism and other specific cognitive developmental conditions. Everything we do is based on good science and we pride ourselves on our ability to translate the latest research into captivating experiences, using traditional media and new technologies. The individuals who comprise the company are proud to have won many international awards for their media, technical and scientific work for public-service projects.

Thank you for buying this DVD Pack. We hope that it is helpful.

Directors, Changing Media Development Ltd, London

www.thetransporters.com