



# Large-Scale Data Shredding Systems

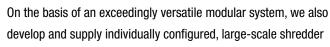
# **Over 50 Years of Experience and Innovation**

# **High quality standards...**

As one of the longest-standing manufacturers of data shredders, we can draw on over 50 years of experience in the data security sector.

intimus® POWER Heavy Duty Shredders provide the utmost operational reliability by combining innovative ideas with uncompromising quality and sophisticated technology. The comprehensive

range of models is tiered to meet practical requirements in terms of security and performance so as to deliver maximum cost effectiveness.



systems alongside our proven serial models. They are tailored to meet our customers' specific requirements or structural conditions. Our experts are available to advise from the planning stages to installation.



# 0-----

...and perfect service

# Seamless data protection needs uninterrupted, failure-free operation.

Therefore all the project phases from development to delivery are subject to continuous quality assurance in compliance with DIN EN ISO 9001:2000. In designing all the intimus® POWER heavy duty shredders, special attention has been paid to providing maintenance-friendly access to all the service points. You can rest assured of on-the-spot assistance if need be, thanks to the company's own service technicians at subsidiaries and over 170 distributors and dealers around the world.



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# **Efficient Solutions for Perfect Data Security on a Large Scale**

# ...for satisfied customers

Machines and service come up against the most exacting demands where uncompromising data security is required or large quantities have to be shredded on schedule.

We therefore consider it to be a validation that among our long-standing partners are numerous central banks, printers of securities, secret services, armed forces and governmental authorities from all over the world, alongside an array of customers from industry and the disposal sector.















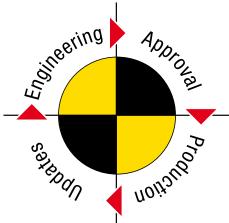
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# i-Protect

Maximum safety. Where high performance cutting systems are deployed there is also a higher potential risk for the operator. We have long since used a proven system for best possible safety: all the possibilities for improving user protection are factored into the development phase. Before our machines go into series production, they are checked by renowned testing agencies, such as VDE, for compliance with all current and forthcoming machine safety regulations and they are modified if necessary. Series production starts only once the machine has passed the testing agency's approval procedures. Once production is underway, improvements are consistently made if they make good sense or are necessary as a result of changed regulations.

With **ESP**, the extended safety package, intimus®*power* Heavy Duty Shredders provide tested and certified safety in all respects. As an example, all the machines come with an emergency stop switch as standard, which can be padlocked against unauthorised use to prevent accidents. Other fittings such as the unique emergency stop bar even push the boundaries of existing regulations.









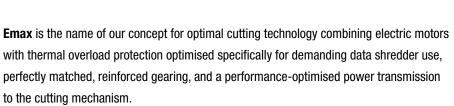


# intimus POWER **Optimal, All-Round Reliability**



**Emax** 

Efficiency is required for swift, cost-effective shredding of large **volumes of data.** The most reliable yardstick for measuring this is the shredder through-put, taking into account all the work steps necessary during machine operation – including "unproductive" ones like emptying the storage container. End-to-end system optimisation is essential for the best possible results.



Low-wear cutting shafts made of hardened special steel with their expertly devised geometry ensure low-loss conversion into high cutting performance.

To enable the high performance of the cutting system to come into play, **EasyRun** incorporates a host of unique features for fast, fatigue-free in-feed and out-feed of material. Combined with the **LogiControl** systems, our machines achieve not only high output but also excellent energy efficiency – a criterion of ever-growing importance when it comes to decisions for buying durable investment goods.



# **Intelligent Control Systems**



# LogiControl

Sophisticated microprocessor controls in all the intimus® POWER data shredders ensure convenient, fully automatic operation.

The machines can be easily operated even with little technical understanding, using just one start and stop button. Once the start button has been pressed, the basic functions of the shredder are automatically controlled, allowing the operator to focus on feeding the material.

Our **ReVerse + ReStart** system with automatic reverse in case of overload and subsequent automatic restart sets the highest standards for convenient, continuous operation with a minimal level of manpower.

Automatic star-delta starting reduces starting current in machines with main drives over 4 kW, preventing the risk of sensitive electrical appliances or the computer system being affected when the shredder is used in office buildings.

**PLC**, the permanent load check, ensures an optimal flow of material in the VZ and VZM systems with multiple cutting systems. The load at all the cutting mechanisms is permanently monitored and the feed of material is adapted if required.







# EasyRun

A machine can develop its full technical potential only if it can be optimally used by the operator. By engaging in close dialogue with our customers, we have come up with a multitude of ergonomic details and incorporated them in the machines. When first coming face-to-face with the machine, the operator is greeted by clearly laid out and easily accessible controls. Easy-grip rotary controls and large pushbuttons give the reassuring feeling that the user will never blunder even under a hectic workload. Visual and audible signals keep the operator fully informed at all times about the operating status of the machine.

Large feed tables, generous feed openings and a host of other thoughtful details, such as the easily emptied mobile container of the solo machines, permit productive, fatigue-free work and hence the operator's permanent access to the full machine potential.









# Staged Design to Meet All Practical Needs and Data Security Requirements

# Performance Requirements and Security Standards

Seamless data protection is (no) child's play. Adequate shredding capacity must be available to enable fast and efficient disposal of data that is no longer required. Machines that are too weak cost valuable time and make shredding a tedious, disliked job, harbouring the risk of documents intended for the shredding process being disposed of intact out of convenience

Sheet capacity and cutting speed are inadequate as yardsticks. The necessary through-put volume in kg/hour can be simply determined from the weight of the documents to be shredded every day and from the time frame envisaged for shredding.

Using this value, you can select the suitable shredder from the different levels available in the range of intimus® POWER Heavy Duty Shredders.



**Absolute priority.** The shred size required is defined by the information content of the documents or by company-specific guidelines. The DIN 32757-1 standard relating to the destruction of information media is helpful here and distinguishes between 5 security levels. Security levels 2 and 3 are most widespread in ordinary business life for practical data protection purposes. Banks and authorities generally use security level 3 and 4 shredders. Government agencies, the armed forces and secret services are subject to top security requirements and therefore use security level 4 and 5 shredders.

Since the mountain of shredded materials combined with the high mixing action of a heavy duty shredder makes it considerably more difficult for data to be reconstructed, DIN 32757-1 permits that in certain circumstances heavy duty shredders of the next-lower security level may be used without compromising security, e.g. a level 2 shredder for destroying level 3 material.

For certain uses, coarse shredding may even be enough. Production scrap or excess material often only has to be degraded to such an extent that it can no longer be placed on the market declared as original goods.

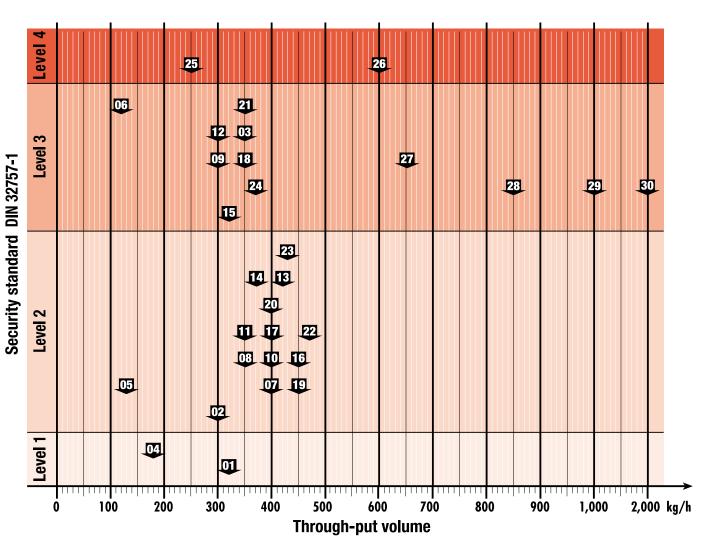
Coarse shredding is again sufficient for the ever more widespread optical and magnetic data media, ensuring that their data cannot be reconstructed without a great deal of time and effort.





# intimus POWER

# **Individualized Performance**



No.	Model	Cross Cut/ Strips mm	Catalogu Page
01	14.95 S	11.8	9
02	14.95 S	5.8	9
03	14.95 S	6 x 50	9
04	14.87	11.8	11
05	14.87	5.8	11
06	14.87	6 x 50	11
07	15.90 S	11.8 x 55	9
80	15.90 S	7.8 x 55	9
09	15.90 S	6 x 50	9
10	15.90 VC	11.8 x 55	13
11	15.90 VC	7.8 x 55	13
12	15.90 VC	6 x 50	13
13	15.85	11.8 x 55	11
14	15.85	7.8 x 55	11
15	15.85	6 x 50	11
16	16.50 S	11.8 x 55	9
17	16.50 S	7.8 x 55	9
18	16.50 S	6 x 50	9
19	16.50 VC	11.8 x 55	13
20	16.50 VC	7.8 x 55	13
21	16.50 VC	6 x 50	13
22	16.86	11.8 x 55	11
23	16.86	7.8 x 55	11
24	16.86	6 x 50	11
25	VZ 14.00	2 x 15	7
26	VZ / VZM 17.00	6 x 15-50	17
27	VZ / VZM 17.00	7.8 x 15-55	17
28	VZ / VZM 18.00	11.8 x 15-55	17
29	VZ / VZM 19.00	11.8 x 15-55	17
30	VZ / VZM 20.00 TWIN	11.8 x 15-55	17



# Also Possible in Large Scale Operation: DIN Security Level 4



The pre-shredded material drops straight onto a conveyor belt and is transported along the shortest route to the follow-up security shredding system.

Follow-up shredding 2 x 15 mm shreds



The 2 x 15 mm cutting system guarantees compliance with DIN 32757-1 security level 4 – thanks to the subsequent compaction of the fine shreds in the integrated bale press, it is even possible for the requirements of security level 5 to be met.

# High Security Shredder

## Perfect shredding and high performance.

The VZ 14.00 Shredder/Baler Combination is an intimus® POWER heavy duty shredder for top security standards.

Comprising a pre-shredder of 6 x 50 mm cutting width followed by a cross-cut shredder of 2 x 15 mm cutting width, an hourly output of up to approx. 250 kg is achieved (depending on feed rate and material to be shredded).

Another positive feature: Stable bales and low-dust handling.

> Security level 4 250 kg/h

High Security Shredder/Baler Combination	Security level DIN 32757-1	<b>Shred size</b> W×L mm	<b>Cutting capacity*</b> A4 sheet, 70g/m <sup>2</sup>	<b>Hourly output</b> actual approx. kg/h	<b>Working width</b> approx. mm
VZ 14.00	4	2 x 15	90-100	250	500

<sup>\*</sup> Sheet capacities vary depending on quality, weight and grain of paper and sufficient power supply.

# **Special Shredding Jobs**

# Ultimate Protection

### Security extends to compact materials.

A need often exists to shred special materials as well, whether for protecting company interests or for security reasons.

The intimus® POWER VZ Special Shredders attend to CDs/DVDs, video cassettes, carbon tapes, PCB's, tins, plastic bottles and so on. Three model ranges and optional extras are combined in a modular system to provide an efficient, cost-effective and secure solution for virtually every conceivable application.

Depending on the shape and composition of the material to be shredded, specially sharpened and shaped blades ensure that it is drawn in largely on its own. The shredded material is ejected straight from the cutting system into large, commercially available refuse containers.

# intimus POWER

**Meeting Every Challenge** 



Efficient work and convenient filling through the feed hopper – with optional cover for protection from spray, and protection for the hands.

VZ Special Shredder	<b>Cutting width</b> mm	<b>Cutting zone</b> W x L mm	Motor rating kW
28/35	20	280 x 350	2.2
35/35	20	350 x 350	2.2
38/50	30	380 x 500	7.5
-		-	



# **Proven in Continuous Daily Use**

# High Through-put Shredders

At the end of the day it's power that counts. intimus® POWER Heavy Duty Shredders have stood the test of time with decades of service as centrally positioned systems for disposing of discarded data media in accordance with data protection requirements. The range offers shredder models for up to 550 sheets or even complete ring binders in one go.

The spacious feed table with integrated conveyor belt provides for controlled, fatigue-free, safe and rapid loading into the cutting mechanism. The shredded material is collected under the cutting mechanism in large mobile or swing-out containers.



intimus® POWER

Heavy Duty Shredders –
space-saving solutions
thanks to installation
next to a wall and forward/
sideways removal of
storage containers.



Simple operation – lockable switches, visual status display and audible "container full" signal.



intimus® POWER 16.50 S, 15.90 S — mobile container and front fold-down panel for effortless removal of shredded material.



**Option:** All heavy duty shredders come prepared as standard for connection to a dust extractor acting directly above the cutting mechanism.

Heavy Duty Shredder	Security level DIN 32757-1	<b>Shred size</b> W×L mm	<b>Cutting capacity*</b> A4 sheet, 70g/m <sup>2</sup>	<b>Hourly output</b> actual approx. kg/f	<b>Working width</b> approx. mm	
16.50 S	3	6 x 50	300-330	350	500	
	2	7.8 x 55	350-420	450	500	
	2	11.8 x 55	400-550	500	500	
15.90 S	3	6 x 50	180-210	300	500	
	2	7.8 x 55	200-260	350	500	
	2	11.8 x 55	260-320	400	500	
14.95 S	3	6 x 50	120-130	350	440	
	2	5.8	120-140	300	440	
	1	11.8	200-210	315	440	

<sup>\*</sup> Sheet capacities vary depending on quality, weight and grain of paper and sufficient power supply.





# **Efficient and Environmentally Compatible**

# Shredder/Baler Combinations

A useful supplement to the heavy duty shredder. The Shredder/Baler Combination automatically compresses the shredded material into compact bales, reducing the volume of shredded material by about 70% as compared with collecting it in loose form.

In this professional solution the shredder and baler operate in tandem. Shredder loading can continue while the baler is compressing the material. An audible "bale completed" signal sounds and the bale is ejected from the compacting chamber at the press of a button.



Useful add-on - the Shredder/Baler Combinations come prepared as standard for the connection of a dust extractor acting directly above the cutting mechanism and in the compacting chamber. This ensures an appreciable improvement in air quality and working conditions.



Heavy duty shredder with 8 ton hydraulic baler

Security level DIN 32757-1	<b>Shred size</b> W×Lmm	<b>Cutting capacity*</b> A4 sheet, 70g/m <sup>2</sup>	<b>Hourly output</b> actual approx. kg/h	<b>Working width</b> approx. mm
3	6 x 50	300-330	370	500
2	7.8 x 55	350-420	420	500
2	11.8 x 55	400-550	470	500
3	6 x 50	180-210	320	500
2	7.8 x 55	200-260	370	500
2	11.8 x 55	260-320	420	500
3	6 x 50	120-130	370	440
2	5.8	120-140	320	440
1	11.8	200-210	340	440
	3 2 2 2 3 3 3 3 2 3 2 3 3 3 3 3 3 3 3 3	3 6 x 50 2 7.8 x 55 2 11.8 x 55 3 6 x 50 2 7.8 x 55 2 11.8 x 55 2 11.8 x 55 2 5.8	3     6 x 50     300-330       2     7.8 x 55     350-420       2     11.8 x 55     400-550       3     6 x 50     180-210       2     7.8 x 55     200-260       2     11.8 x 55     260-320       3     6 x 50     120-130       2     5.8     120-140	

<sup>\*</sup> Sheet capacities vary depending on quality, weight and grain of paper and sufficient power supply.







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# **Innovative Volume Reduction**

# VibroCompactors

An authentic MARTIN YALE innovation. The volume of shredded material is reduced by a vibrating compactor. This economical alternative to baling ensures space-saving installation of the intimus® POWER Heavy Duty Shredder and nevertheless guarantees the advantage of compaction.

The high compression ratio is achieved in the VibroCompactors by horizontal vibration. Three shred collection versions are offered: disposable containers made from recycled material, reusable containers with plastic liner or a two-chamber system with the effect that when emptying, each bag weighs less.



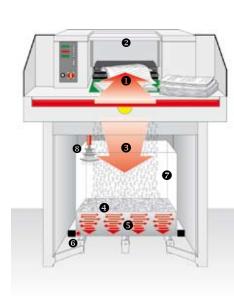
Vibro Compactor	Security level DIN 32757-1	<b>Shred size</b> W × L mm	<b>Cutting capacity*</b> A4 sheet, 70g/m <sup>2</sup>	<b>Hourly output</b> actual approx. kg/h	<b>Working width</b> approx. mm	
16.50 VC	3	6 x 50	300-330	350	500	
	2	7.8 x 55	350-420	400	500	
	2	11.8 x 55	400-550	450	500	
15.90 VC	3	6 x 50	180-210	300	500	
	2	7.8 x 55	200-260	350	500	
	2	11.8 x 55	260-320	400	500	

 $<sup>^{\</sup>star}$  Sheet capacities vary depending on quality, weight and grain of paper and sufficient power supply.



### **Work Sequence of the VibroCompactor**

- 1 Input of paper etc. via conveyor belt
- Material cut into particles
- Particles fall into container
- Horizontal shuttling of the container ensures even distribution
- and compacting of the particles
- Automatic container clamping fixture
- Container: disposable cardboard box or reusable container with plastic liner
- Automatic cut-out when container is filled to capacity



# **Efficient Dust Reduction**



# For Clean and Safe Work

# **Dust Extractors**

For improved working conditions. Dust is inevitably generated when shredding paper. The dust extractor sucks it off at the critical points to prevent it escaping into the ambient air.

The efficient, add-on dust extractor creates a distinct improvement in the working conditions when shredding and compacting dust-intensive materials. This means that the heavy duty shredders are more versatile with respect to the locations at which they can be used. intimus®POWER Shredders come prepared for dust extractor connection. A retro fit option is available for existing heavy duty shredders.



Simple handling - the filter is cleaned if necessary from the outside, using a shaker.



Quick monitoring - the minimum volumetric flow rate is monitored by an integrated vacuum gauge.



Easy to change - effortless bag change thanks to swing-out container with level monitoring.



### Full safety features -



B1 type dust explosion-protected design, approved for the extraction of combustible dust of dust explosion classes St 1 and St 2

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# A Modular System with Flexibility and High Performance

# VZ / VZM Series Shredder systems

- Material feed. The conveyor system consists of a rugged, low-maintenance rubber conveyor belt. The system processes the material for shredding virtually on its own thanks to ideal matching of conveyor studs and belt speed. The fully automated power supply and the operation are managed by the shredder. The conveyor belt is available in a variety of special executions in order to assure ideal adaptation to local conditions and work sequences. Electro-hydraulic lift and turn mechanisms are available for emptying customer-specific storage containers.
- **2 Pre-shredder.** Thick bundles of material are cut into strips 30 to 40 mm wide in the

pre-shredder. The large cutting area and high power output assure uninterrupted material flow, high through-put volumes and ideal pre-processing for subsequent security shredding.

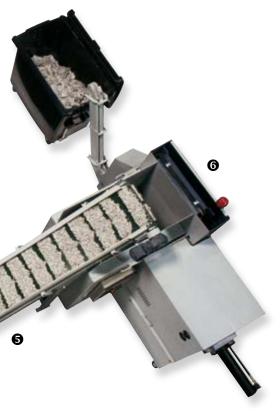
● Magnetic separator. The VZM shredders are equipped with an integrated magnetic separator. After pre-shredding, ferromagnetic parts typically included in the material to be shredded are removed. On the one hand, this protects the security cutting system from excessive wear and, on the other hand, it assures that waste paper is not contaminated with foreign materials. The scrapped metal parts are collected in a mobile receptacle from which they can be disposed.

Security cutting system. In the second shredding stage, the precision cutting cylinders made from special hardened steel allow for high through-put volumes with minimal wear and low power consumption. The through-put volumes range from 600 to approx. 2,000 kg per hour (depending upon material to be shredded). The complete VZ/VZM series systems are delivered with a certificate of compliance with DIN 32757-1 for security level 3 shredding of confidential documents, and security level 4 shredding of secret documents.

**Expandable controls.** All system functions are monitored and controlled by a micro-computer in a fully automated fashion. Upstream and

downstream devices can also be subsequently integrated into the controls with minimal effort. This will assure maximum process reliability of the entire system and efficient adaptation to prevailing operating conditions.

Sonveyor technology. The shredding systems can be adapted to local conditions at the discharge end as well. They can be linked to special conveyor belts, scraper chain conveyors or vacuum extraction systems for transporting shredded particles to storage containers, or to additional process



steps in compacting containers or channel balers.

- **6** Storage and compacting. Specially suited storage and compacting equipment is recommended for further processing of shredded particles. Simple storage solutions (containers), as well as specially configured compacting equipment for volume reduction can be supplied upon request.
- ◆ Air purification equipment. Dust particles are inevitably generated during shredding as a result of the cutting and

tearing process. Materials to be shredded are also frequently dusty and this dust is released into the atmosphere during the shredding process. Working conditions can be significantly improved through the use of a dust extraction system.

### Operation.

The clearly designed control cabinets of the VZ/VZM shredders are positioned for easy access in the systems. If required, operation of the system can be facilitated with a separate control panel which can be installed, for example, in the material feeding area. It is fully equipped with all operating controls and display elements, and is connected to the shredder's control cabinet.

# intimus POWER A Modular System









### **Customised Solutions.**

System components, as well as configuration and expansion by means of a modular concept, allow for adaptation to your individual requirements.





# VZ / VZM Series Shredder systems

High Performance Shredders for Professional Use by Disposal Service Providers

- High through-put volumes of 600 to 2,000 kg per hour with minimal energy consumption
- Security level 3 or 4 per
  DIN 32757-1 with certificate
- Minimal personnel requirements thanks to fully automated operation



### Continuous feed

- Material is fed with a rugged, studded conveyor
- Conveyor belt with large capacity feed hopper allows filling at an ergonomic height
- Large, sturdy studs prevent material from sliding back
  - Fully automated power supply and operation of the feed conveyor are managed by the shredder



### Stage 1: Pre-shredding

- Thick bundles of paper are processed just as easily as filled ring binders
- Rough pre-shredding of material is accomplished by means of abrasion-resistant cutting cylinders made of hardened tool steel
- Ideal preparation of material to be shredded for subsequent processing steps
- Low-maintenance cutting system consisting of individually interchangeable cutters and scraper blades, which can be repeatedly re-ground



Model VZ/VZM 17.00

Security level DIN 32757-1 Level 4 / 3

Actual through-put kg/h\* 600 / 650

\*Values ascertained with new cutting systems, depends upon material to be shreddedd, supply power and feed system



### Integrated conveyor belt

- Covered transport from pre-shredding to the security cutting system
- A metering screw prevents paper jam and assures problem-free operation
- Overfill protection is provided by means of a limit switch



### VZM series:

### With integrated magnetic separator

- No time-consuming removal of metal parts before shredding – the magnetic separator automatically removes the ferromagnetic parts which are typically included in ring binders and hanging file folders
- Protects the security shredder from excessive wear due to metal parts
- Metal parts are collected separately in a mobile receptacle



### Stage 2: Security shredder

- Precision cutting cylinders made of special hardened steel with metering device assure high through-put volumes with minimal wear and low energy consumption
- During security shredding, materials are reduced to particle sizes in accordance with security level 3 or 4 (depending on selected cutting system) per DIN 32757-1.
   A certificate will be enclosed with the machine.
- Overfill inhibited by means of limit switch



### **Outstanding ease of maintenance**

- All relevant covers included on the machine are equipped with quick release fasteners
- Access is thus quick and easy for cleaning, repair and maintenance





### **Extremely easy operation**

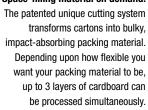
- All operating functions are controlled electronically after the start button has been activated
- Clearly laid out control panel
- Fully automated control via microcomputer with automatic shutdown when in idle operation
- Auto-reverse with automatic re-start in the event of overload
- All parameters can be individually set during installation



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### Space-filling material on demand.



SSE

Dust particles created by the process are eliminated inside the machine by a special system of scrapers and deflectors.

**Optional:** A retro-fit kit permits the

# Where dust is a factor.

connection of a commercially available industrial vacuum cleaner.





# Packaging Material Shredder

High quality packaging material for free. The PacMaster and PacMate convert cardboard cartons into large-volume pads suitable

Shred and reap the benefit:

Does away with costly disposal of discarded packaging.

	grid	ng capacity IS	r feed widt	r feed heig	ng capacity հ
Packaging Material Shredder	<b>Pad g</b> mm	<b>Cuttir</b> cartor	<b>Cutter</b> mm	<b>Cutte</b> mm	Cuttir m <sup>3</sup> / t
PacMaster S	4 x 110	2 -3 Lagen	425	20	5 -7*
PacMaster VS*	4 x 110	3 Lagen	425	20	7 11*
PacMate	3.8 x 112	1 Lage	400	10	1.2*

\*pre-processed material

### \*VS / Vario-Speed - Electronically controlled power demand.

Vario-Speed automatically adjusts the operating speed to the current machine workload.

Thin cardboard: The operating speed can be increased by up to 50%.

Thick cardboard: The speed is decreased to provide more power.



# PacMate Packaging Material Shredder

...the compact table top machine



# nformation coupon

# **INTIMUS** POWER Large-Scale Data Shredding Systems

Please fill in this coupon and send it to

- We'd like a free on-site consultation.

  Please contact us to make an appointment.
- We'd like in-depth information and detailed technical data on the intimus® POWER Heavy Duty systems
  - High Security Heavy Duty Shredder
  - VZ SERIES Special Shredder
  - Heavy Duty Shredders, Solo Versions
  - Shredder/Baler Combinations
  - VibroCompactors
  - VZ/VZM SERIES
    Heavy Duty Shredder Systems
  - Dust Extractors
  - Packaging Material Shredders

### Sender

Company

Line of business

Person responsible

Department

Phone Fax

E-mail

Postcode / Town

Date Signature

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20

# intimus PRO **Professional Data Shredders**

Consulting, sales and service from

the intimus®POWER partner



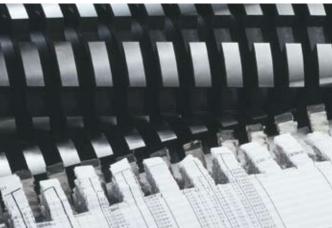




# intimus CRYPTO

**High Security Data Shredder** 







**Heavy Duty Shredders**