



Business Plan  
for  
*Blue Arrows e.V.*



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## 1 Introduction / Project idea

Why would somebody be so crazy and jump voluntarily out of an airplane?

For us - S. Sasonow, F. Schneider and K. Schumacher - that is not such a strange idea! We love sky-diving and unfortunately the closest possibility to perform our sport is in Grefrath which is located close to Neuss – about 75 km away.



Skydiving gives you a kick! You feel the enormous acceleration of your body, you feel free and happy!

In fact, it is beyond words and everyone who once tried it will be all for it. Besides it is not only a sport for students. Everybody from the age of seven on is legally allowed to jump with a tandem master.

Since we know more people in Aachen and surroundings who are also big fans of the parachuting sport, we decided to found our own association: The *Blue Arrows e.V.*

Our intention is to provide a possibility for all hobby-sky divers to perform jumps, but also to offer tandem jumps for newcomers. For infected people we will offer jumping courses (AFF) to become a real sky-diver. Furthermore we will offer paragliding courses for everyone who prefers the bird-like feeling of a long flight and the gorgeous view 1000 metres above the ground.



## 2 Legal form

We decided to found an association (e.V.), because we intend to let parachuting still be our hobby, but not our profession. An e.V. does not intend to make profit although he is allowed to gain money.

To run an association (e.V) only a few conditions must be fulfilled:

- name
- decide where it is placed (address)
- function must be specified
- it must be registered officially (local court, notary)
- seven foundation members who sign the articles of association

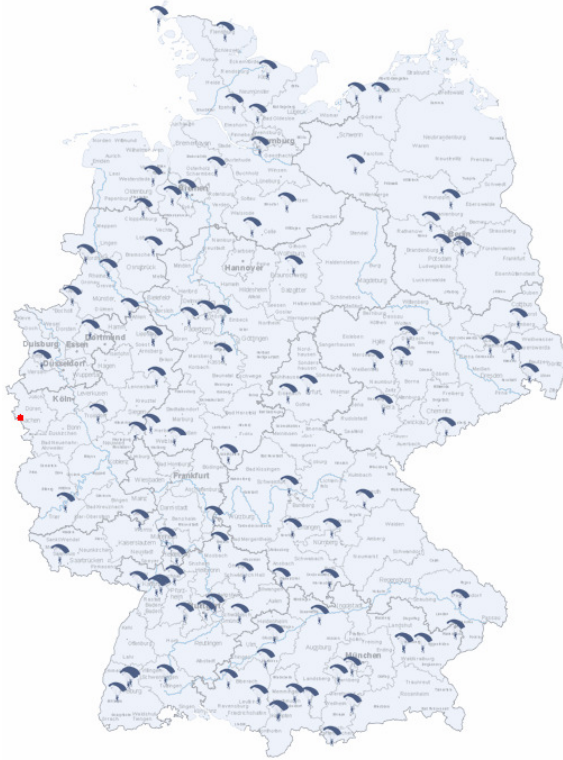
Further it is quite easy to join or quit an association.



### 3 Market analysis

At the moment there are no possibilities to do parachuting in the closer surroundings of Aachen (cf. picture on the left). So we searched for an adequate place to found our association and decided for the airport in Merzbrück which has different advantages. It is easily reachable by car, because there is a direct exit from the highway A44. There is also a connection for public transport.

Further land neighbouring the airport can be hired from the government agency (Aachen) and small airplanes can be chartered from the local Westflug GmbH.





## 4 Offers

We want to provide different offers: freefall jumping and AFF-courses, tandem jumps and paragliding courses.



On one hand people who have their own licences shall get the possibility to jump either as members or guests paying different prices.

We start in Merzbrück and climb to an altitude of approximately 4000m where we jump out of the airplane. It follows a period of freefall (35 sec.) before the ripcord is pulled. After a few minutes the ground is reached. On the other hand we will offer jumps with a tandem master for newcomers. After a short instruction the volunteer becomes fixed with his gear in front of an experienced tandem master (instructor). The exit altitude is also about 4000m. The tandem master is always in charge of the ripcord. A few minutes later both will land safely.



Newcomers who want to join our sport afterwards can take part in our AFF courses. In the end of this course the participant receives a licence which allows him to jump alone. The course includes theoretical lessons and at least seven jumps with varying degrees of difficulty. The licence is only handed out after successfully passing the final examination.



In addition we offer courses for paragliding. They consist of theoretical and practical elements, too. The practical part includes at least 20 flights with altitude differences of 40 – 100 meters. In contrast to sky-diving lessons one must acquire a lot of knowledge in aviation law, radio operation and meteorology during the theoretical education.



## 5 Cost Calculation

In this chapter we show how our project shall be financed

### 5.1 Start Up Investments

At first here is presented a list of our start-up investments. The technical equipment has the lion's share of the costs with 88.380,00 €. Our total start-up investment adds up to around 132.000 €.

Start-up investment						
item	price	amount	total investment	asset life	percentage	annual depreciation cost
	[€]	[pcs]	[€]	[years]	[x*100%]	[€/year]
<b>vehicles</b>						
van	28.000,00 €	1	28.000,00 €	5	0,2	5.600,00 €
<b>accessory</b>						
parachute (freefall)	1.650,00 €	15	24.750,00 €	10	0,1	2.475,00 €
parachute (gliding)	3.500,00 €	15	52.500,00 €	10	0,1	5.250,00 €
all in one suit	20,00 €	20	400,00 €	10	0,1	40,00 €
helmet	200,00 €	20	4.000,00 €	10	0,1	400,00 €
glasses	22,00 €	20	440,00 €	10	0,1	44,00 €
glove	27,00 €	20	540,00 €	10	0,1	54,00 €
altimeter	100,00 €	20	2.000,00 €	10	0,1	200,00 €
radio unit	90,00 €	5	450,00 €	10	0,1	45,00 €
camera	1.100,00 €	3	3.300,00 €	10	0,1	330,00 €
<b>office equipment</b>						
computer	500,00 €	3	1.500,00 €	4	0,25	375,00 €
printer	100,00 €	1	100,00 €	4	0,25	25,00 €
beamer	500,00 €	1	500,00 €	10	0,1	50,00 €
laptop	400,00 €	1	400,00 €	4	0,25	100,00 €
board	150,00 €	1	150,00 €	10	0,1	15,00 €
screen	100,00 €	1	100,00 €	10	0,1	10,00 €
telefon	25,00 €	1	25,00 €	10	0,1	2,50 €
<b>kitchen equipment</b>						
fridge	100,00 €	1	100,00 €	10	0,1	10,00 €
coffee machine	30,00 €	1	30,00 €	10	0,1	3,00 €
mikro wave	50,00 €	1	50,00 €	10	0,1	5,00 €
garbage can	10,00 €	4	40,00 €	10	0,1	4,00 €
<b>financing</b>						
registration	85,00 €	1	85,00 €			0,00 €
cash on hand	500,00 €	1	500,00 €			0,00 €
<b>total investment</b>			<b>119.960,00 €</b>			
unforeseen (10%)			11.996,00 €			
<b>total start up investment</b>			<b>131.956,00 €</b>	<b>total depreciation cost</b>		<b>15.037,50 €</b>



## 5.2 Financing Costs

As we mentioned above we need a capital of 132.000 € for our start-up investment. We will loan 60% of that and finance 40% ourselves. We plan to distribute this amount of around 53.000 € amongst the seven foundation members of *Blue Arrows e.V.*. Further we planned to pay back our debt within the first five years with an annual rate of nearly 16.000 €.

financing costs			
start-up investment costs	131.956,00 €		
40% equity capital	52.782,40 €		
60% credit loan capital	79.173,60 €		
interest rate	7%		
running time (Years)	5		
year	remaining dept	interest costs per year	repayment per year
1	79.173,60 €	5.542,15 €	15.834,72 €
2	63.338,88 €	4.433,72 €	15.834,72 €
3	47.504,16 €	3.325,29 €	15.834,72 €
4	31.669,44 €	2.216,86 €	15.834,72 €
5	15.834,72 €	1.108,43 €	15.834,72 €
<b>Money Paid Back</b>		<b>16.626,46 €</b>	<b>79.173,60 €</b>



### 5.3 Fixed Costs

One part of our fixed costs are to pay our staff – mainly instructors.

personnel costs			
employment	number	costs per month	costs per year
chairman	1	honorary	0,00 €
vice-chairman	1	honorary	0,00 €
treasurer	1	honorary	0,00 €
business manager	1	honorary	0,00 €
kid man	1	honorary	0,00 €
secretary	1	honorary	0,00 €
webmaster	1	honorary	0,00 €
instructor	3	400,00 €	4.800,00 €
tandemmaster	10	400,00 €	4.800,00 €
cleaning lady	1	200,00 €	1.600,00 €
<b>total costs</b>			<b>11.200,00 €</b>

The main part of the fixed costs is formed by chartering the airplane and hiring a pilot in a fixed contract. Another big part is formed by the rent of land and containers. All together this accounts to around 90% of the total fixed costs.

fixed costs					
description	price		amount	costs per month	costs per year
charter costs for airplane incl. fuel	250,00 €	/h	90	22.500,00 €	180.000,00 €
landing fee	10,00 €	/landing	180	1.800,00 €	14.400,00 €
hire for pilot	68,00 €	/h	90	6.120,00 €	48.960,00 €
rent for property	4,75 €	/m <sup>2</sup>	200	950,00 €	11.400,00 €
container	1499,25 €	/month	4	5.997,00 €	47.976,00 €
van insurance	1600,00 €	/year	1	-	1.600,00 €
van tax	430,00 €	/year	1	-	430,00 €
accident insurance	1,92 €	/parachute	20	38,40 €	460,80 €
third party risk (instructors)	7,67 €	/human	3	23,01 €	276,12 €
requalification (tandemmaster)	75,00 €	/human	13	-	975,00 €
requalification (instructor)	200,00 €	/human	3	-	600,00 €
website	50,00 €	/month	1	50,00 €	600,00 €
fee for waste disposal	50,00 €	/month	1	50,00 €	600,00 €
bank account	5,00 €	/month	1	5,00 €	60,00 €
<b>Total</b>					<b>308.337,92 €</b>





### 5.4 Variable Costs

Our variable costs include insurances, fees for water, electricity, and telephone/internet, consumables and drinks. The costs for some items are thought to rise each year by 5 %, because of the general price increase.

Since we pay off our loan after the first five years, we make more profit from year six on. That allows us to spent more money for our trips to jump locations in Germany and foreign countries.

Variable Costs						
	Percentage	1. Year	2. Year	3. Year	4. Year	5. Year
third person risk		15,50 €	17,05 €	18,76 €	20,16 €	21,17 €
advertising		6.000,00 €	4.800,00 €	3.600,00 €	2.800,00 €	2.400,00 €
office equipment	5%	100,00 €	105,00 €	110,25 €	115,76 €	121,55 €
consumption equipment	5%	190,00 €	199,50 €	209,48 €	219,95 €	230,95 €
Telephone/Internet		600,00 €	600,00 €	600,00 €	600,00 €	600,00 €
trips		-	5.000,00 €	5.000,00 €	5.000,00 €	5.000,00 €
Water	5%	600,00 €	630,00 €	661,50 €	694,58 €	729,30 €
electricity	5%	600,00 €	630,00 €	661,50 €	694,58 €	729,30 €
beverage (water)	5%	360,00 €	378,00 €	396,90 €	416,75 €	437,58 €
others		3.000,00 €	3.000,00 €	3.000,00 €	3.000,00 €	3.000,00 €
<b>Total</b>		<b>11.465,50 €</b>	<b>15.359,55 €</b>	<b>14.258,38 €</b>	<b>13.561,77 €</b>	<b>13.269,86 €</b>
	Percentage	6. Year	7. Year	8. Year	9. Year	10. Year
third person risk		22,02 €	22,68 €	23,13 €	23,36 €	23,60 €
advertising		2.000,00 €	2.000,00 €	1.600,00 €	1.600,00 €	1.600,00 €
office equipment	5%	127,63 €	134,01 €	140,71 €	147,75 €	155,13 €
consumption equipment	5%	242,49 €	254,62 €	267,35 €	280,72 €	294,75 €
Telephone/Internet		600,00 €	600,00 €	600,00 €	600,00 €	600,00 €
trips		7.500,00 €	7.500,00 €	7.500,00 €	7.500,00 €	7.500,00 €
Water	5%	765,77 €	804,06 €	844,26 €	886,47 €	930,80 €
electricity	5%	765,77 €	804,06 €	844,26 €	886,47 €	930,80 €
beverage (water)	5%	459,46 €	482,43 €	506,56 €	531,88 €	558,48 €
others		3.000,00 €	3.000,00 €	3.000,00 €	3.000,00 €	3.000,00 €
<b>Total</b>		<b>15.483,14 €</b>	<b>15.601,85 €</b>	<b>15.326,27 €</b>	<b>15.456,65 €</b>	<b>15.593,55 €</b>



### 5.5 Total Costs per Year

The following table is a summary of all costs shown before as forecast for ten years.

Total Costs per Year					
	1st Year	2nd Year	3rd Year	4th Year	5th Year
<b>Financing costs</b>	5.542,15 €	4.433,72 €	3.325,29 €	2.216,86 €	1.108,43 €
<b>Fixed costs</b>	308.337,92 €	308.337,92 €	308.337,92 €	308.337,92 €	308.337,92 €
<b>Personell costs</b>	11.200,00 €	11.200,00 €	11.200,00 €	11.200,00 €	11.200,00 €
<b>Depreciation</b>	15.037,50 €	15.037,50 €	15.037,50 €	15.037,50 €	15.037,50 €
<b>Variable costs</b>	11.465,50 €	15.359,55 €	14.258,38 €	13.561,77 €	13.269,86 €
<b>Total</b>	<b>351.583,07 €</b>	<b>354.368,69 €</b>	<b>352.159,09 €</b>	<b>350.354,05 €</b>	<b>348.953,71 €</b>
	6th Year	7th Year	8th Year	9th Year	10th Year
<b>Financing costs</b>	0,00 €	0,00 €	0,00 €	0,00 €	0,00 €
<b>Fixed costs</b>	308.337,92 €	308.337,92 €	308.337,92 €	308.337,92 €	308.337,92 €
<b>Personell costs</b>	11.200,00 €	11.200,00 €	11.200,00 €	11.200,00 €	11.200,00 €
<b>Depreciation</b>	15.037,50 €	15.037,50 €	15.037,50 €	15.037,50 €	15.037,50 €
<b>Variable costs</b>	15.483,14 €	15.601,85 €	15.326,27 €	15.456,65 €	15.593,55 €
<b>Total</b>	<b>350.058,56 €</b>	<b>350.177,27 €</b>	<b>349.901,69 €</b>	<b>350.032,07 €</b>	<b>350.168,97 €</b>



## 5.6 Income

Now we list our income positions. About 50% of our main income derives from the tandem jumps, another big part from single jumps by members.

As we already mentioned earlier we plan to pay back our loan within the first five years. That enables us to lower all prices of jumps from year six on. The maximum amount of jumps results of the hours the airplane and the pilot are at our disposal. The table shows how we expect the distribution of different jump types to be.

income from jumps (year 1 to 5)				
	amount jumps		unit price	income
tandem jump	20%	1383	195,00 €	269.685,00 €
fee for jump of member	67%	4634	25,00 €	115.850,00 €
fee for jump of an external club member	10%	685	40,00 €	27.400,00 €
course fees: AFF and paragliding	3%	50	1.550,00 €	77.500,00 €
video recording	-	484	95,00 €	45.980,00 €
<b>total income</b>				<b>536.415,00 €</b>

income from jumps (year 6 to 10)				
	amount jumps		unit price	income
tandem jump	15%	1030	170,00 €	175.100,00 €
fee for jump of member	72%	4980	15,00 €	74.700,00 €
fee for jump of an external club member	10%	692	30,00 €	20.760,00 €
course fees: AFF and paragliding	3%	50	1.550,00 €	77.500,00 €
video recording	-	361	95,00 €	34.295,00 €
<b>total income</b>				<b>382.355,00 €</b>



We think that 50 members will join our association within the first year. Thereafter, we expect our association to reach a number of 76 members until the 10th year. Our members must pay a membership fee of 150,00 € each year.

After five years, when we will have payed off our loan, the membership fee will be reduced to 100,00 € per year.

<b>Membership fees per year</b>					
	<b>1st Year</b>	<b>2nd Year</b>	<b>3rd Year</b>	<b>4th Year</b>	<b>5th Year</b>
Memberships	50	55	61	65	68
<b>Membership fees</b>	<b>7.500,00 €</b>	<b>8.250,00 €</b>	<b>9.150,00 €</b>	<b>9.750,00 €</b>	<b>10.200,00 €</b>
	<b>6th Year</b>	<b>7th Year</b>	<b>8th Year</b>	<b>9th Year</b>	<b>10th Year</b>
Memberships	71	73	75	75	76
<b>Membership fees</b>	<b>7.100,00 €</b>	<b>7.300,00 €</b>	<b>7.500,00 €</b>	<b>7.500,00 €</b>	<b>7.600,00 €</b>

Now follows an overview of our total income per year. In the first years we will not operate at full capacity. But the operating grade (number of jumps) will increase every year by 2,5%. Like we mentioned above we lower our prices after the fifth year and therefore expect an abrupt rise of income of 5% for the sixth year. Thereafter we will return to a growth rate of 2,5% each year. In the tenth year we finally reach an operation grade of 100%.

<b>total income per year</b>					
	<b>1st year</b>	<b>2nd year</b>	<b>3rd year</b>	<b>4th year</b>	<b>5th year</b>
max. income from jumps	536.415,00 €	536.415,00 €	536.415,00 €	536.415,00 €	536.415,00 €
percentage expected	70,0%	75,0%	80,0%	82,5%	85,0%
expected income from jumps	375.490,50 €	402.311,25 €	429.132,00 €	442.542,38 €	455.952,75 €
membership fee	7.500,00 €	8.250,00 €	9.150,00 €	9.750,00 €	10.200,00 €
<b>total income</b>	<b>382.990,50 €</b>	<b>410.561,25 €</b>	<b>438.282,00 €</b>	<b>452.292,38 €</b>	<b>466.152,75 €</b>
	<b>6th year</b>	<b>7th year</b>	<b>8th year</b>	<b>9th year</b>	<b>10th year</b>
max. income from jumps	382.355,00 €	382.355,00 €	382.355,00 €	382.355,00 €	382.355,00 €
percentage expected	90,0%	92,5%	95,0%	97,5%	100,0%
expected income from jumps	344.119,50 €	353.678,38 €	363.237,25 €	372.796,13 €	382.355,00 €
membership fee	7.100,00 €	7.300,00 €	7.500,00 €	7.500,00 €	7.600,00 €
<b>total income</b>	<b>351.219,50 €</b>	<b>360.978,38 €</b>	<b>370.737,25 €</b>	<b>380.296,13 €</b>	<b>389.955,00 €</b>



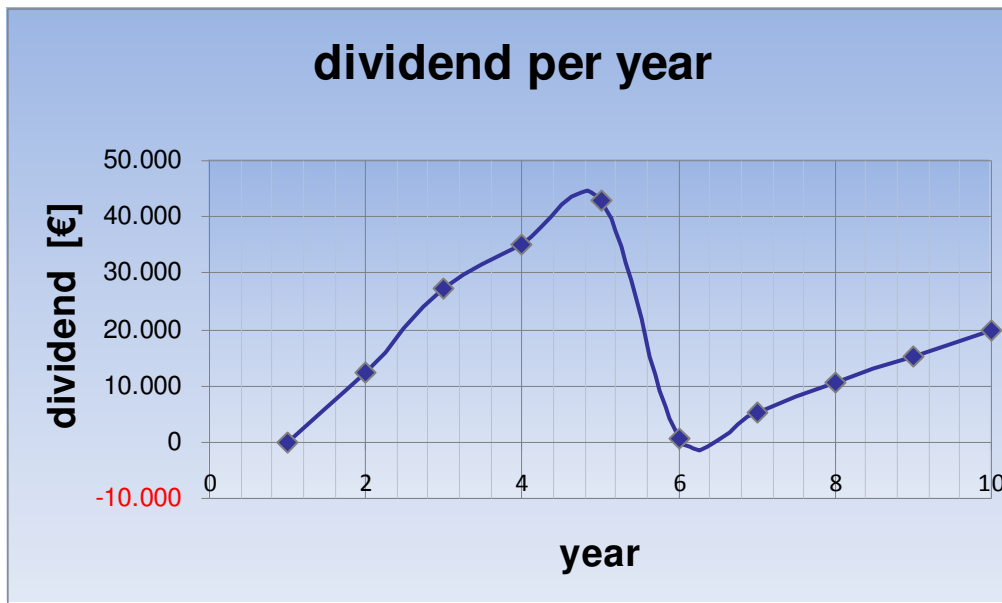
## 5.7 Cash Flow

Finally here is an overview in form of our cash flow for ten years and two graphs illustrating the dividend and the cash flow per year. As one can see we make profit from the 2nd year on. All earned money serves as savings for future expenditures.

Cash Flow per Year					
	1st Year	2nd Year	3rd Year	4th Year	5th Year
Real Income	382.990,50 €	410.561,25 €	438.282,00 €	452.292,38 €	466.152,75 €
Total costs	351.583,07 €	354.368,69 €	352.159,09 €	350.354,05 €	348.953,71 €
loss forward	-	131,01 €	0,00 €	0,00 €	0,00 €
<b>Total</b>	<b>31.407,43 €</b>	<b>56.061,55 €</b>	<b>86.122,91 €</b>	<b>101.938,33 €</b>	<b>117.199,04 €</b>
Tax - 50%	15.703,71 €	28.030,77 €	43.061,45 €	50.969,16 €	58.599,52 €
Profit after tax	15.703,71 €	28.030,77 €	43.061,45 €	50.969,16 €	58.599,52 €
<b>Cash Flow</b>	<b>15.703,71 €</b>	<b>28.030,77 €</b>	<b>43.061,45 €</b>	<b>50.969,16 €</b>	<b>58.599,52 €</b>
Repayment Credit	15.834,72 €	15.834,72 €	15.834,72 €	15.834,72 €	15.834,72 €
<b>Dividend</b>	<b>-131,01 €</b>	<b>12.196,05 €</b>	<b>27.226,73 €</b>	<b>35.134,44 €</b>	<b>42.764,80 €</b>
<b>Total Cash Position</b>	<b>-131,01 €</b>	<b>12.065,05 €</b>	<b>39.291,78 €</b>	<b>74.426,23 €</b>	<b>117.191,03 €</b>
	6th Year	7th Year	8th Year	9th Year	10th Year
Real Income	351.219,50 €	360.978,38 €	370.737,25 €	380.296,13 €	389.955,00 €
Total costs	350.058,56 €	350.177,27 €	349.901,69 €	350.032,07 €	350.168,97 €
loss forward	0,00 €	0,00 €	0,00 €	0,00 €	0,00 €
<b>Total</b>	<b>1.160,94 €</b>	<b>10.801,10 €</b>	<b>20.835,56 €</b>	<b>30.264,05 €</b>	<b>39.786,03 €</b>
Tax - 50%	580,47 €	5.400,55 €	10.417,78 €	15.132,03 €	19.893,01 €
Profit after tax	580,47 €	5.400,55 €	10.417,78 €	15.132,03 €	19.893,01 €
<b>Cash Flow</b>	<b>580,47 €</b>	<b>5.400,55 €</b>	<b>10.417,78 €</b>	<b>15.132,03 €</b>	<b>19.893,01 €</b>
Repayment Credit	0,00 €	0,00 €	0,00 €	0,00 €	0,00 €
<b>Dividend</b>	<b>580,47 €</b>	<b>5.400,55 €</b>	<b>10.417,78 €</b>	<b>15.132,03 €</b>	<b>19.893,01 €</b>
<b>Total Cash Position</b>	<b>117.771,50 €</b>	<b>123.172,05 €</b>	<b>133.589,83 €</b>	<b>148.721,86 €</b>	<b>168.614,87 €</b>



Here you can see the important results from our cashflow again:



The dividend is rising at first, because our income increases by an increasing fraction of tandem jumps. It falls down in the sixth year because after successfully refunding our credit we are able to lower all prices and the fraction of jump types changes. From then on our dividend rises steadily.



In this graph – showing the total cash position - the slope flattens from the sixth year on. That is due to our price reductions. Nevertheless we continue to make profit and so we are able to built up savings for later investions like renew our equipment or change the living containers into an own club house.

Due to these positive data, we come to the conclusion that our idea to found the Blue Arrows association could be realized.